The Mountains of Oregon

By W. G. Steel.

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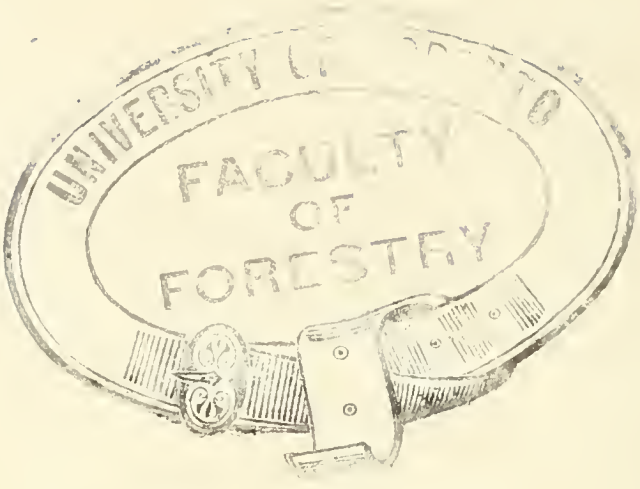
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THE MOUNTAINS OF OREGON

BY

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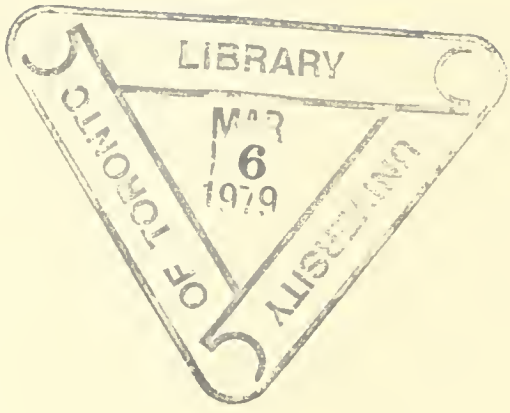

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Preface.

This little volume has not been written with the expectation of accomplishing a mission, or even attracting general attention, but simply to put into permanent form a small portion of information that is constantly appearing in newspaper articles. Such information usually comes from abler pens than mine, but it is all the more pity that it is not in proper shape for future use. If it amuses, entertains or instructs those who peruse it, its aim will be accomplished, and its author satisfied.

There is, however, a word of explanation due for the manner in which it is arranged. It was not begun with the intention of publishing a book, but in response to numerous requests received for descriptions of Crater Lake and Mt. Hood. As it was impossible at the time to answer them satisfactorily, it was decided to print a letter on each subject, and issue as a small pamphlet. Before this was accomplished the discovery was made that the space allotted was entirely inadequate, so, acting on the advice of friends, this form was adopted; too late, however, to prevent the present arrangement.

W. G. S.

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Illumination of Mount Hood.

MOUNT Hood is located in the Cascade range in Oregon, twenty-five miles south of the Columbia river. It is about twelve thousand feet high, and is visible over a large part of the State. Above an elevation of five thousand feet it is covered with perpetual snow. It stands sixty miles east of Portland, a monument of beauty, and the pride of Oregon. In the spring of 1885 the idea originated of illuminating it with red fire. An effort was made to carry this into effect on the following 4th of July, but failed for the reason that, instead of staying with it over night, a system of clock work and acids was devised, which was perfectly willing to do the work assigned, but an ugly avalanche came along at four o'clock in the afternoon, broke the bottles of acid and set the whole thing ablaze. In 1887, the Celebration Committee of Portland, decided to make the trial, and placed the matter in charge of the writer, who was accompanied by N. W. Durham, correspondent of the *Oregonian*, O. C. Yocum, photographer, Dr. J. M. Keene, J. M. Breck, Jr., C. H. Gove and Chas. F. Adams. More agreeable, determined and competent associates I never met. Breck was a cripple, finding it necessary at all times to walk with a crutch, yet, a better mountain climber is hard to find.

Everything being placed in readiness, we left Portland at 6 o'clock A. M., Friday July 1st, and reached Government Camp at 5 o'clock in the afternoon of the second. From this point, the mountain rises to the north in all its beauty and grandeur, with timber line apparently within a few rods, instead of four miles, the actual distance. Here the wagons were left, and two horses were packed with blankets and provisions, and our journey was resumed as soon as possible. It was necessary to cross two small streams, over both of which the bridges had fallen, so we were compelled to carry logs and fill in until it was possible to get the horses over. About nine o'clock, finding that we could not reach timber line, it was decided to camp on some friendly rocks near at hand. Here we found the trees thickly covered with a long, dry moss, which afforded excitement for the evening, for, no sooner had the inner man's longings been supplied, than lighted matches were applied to the moss, which blazed furiously until it died out in the distance, simply for the want of material. The scene, while it lasted, was indeed brilliant, and accompanied by a roar that seemed but the echo of thunder. Already exhausted, after three hours plodding through snow knee deep, we sank to rest and slept soundly until four o'clock. At five we were on our way, somewhat surprised to see that the snow remained as soft as on the evening before. In addition to the difficulty of sinking each step nearly to our knees, each man was loaded with fifty pounds of blankets, provisions or red fire, while three tugged sav-

agely at a heavily loaded toboggan. At noon we lunched at timber line. It was hardly a sumptuous repast, but answered every requirement, there being canned Boston brown bread and beef tea, mixed with snow and seasoned with smoke. Not a dainty dish, to be sure, but "the best the market afforded." After lunch we dragged our weary way along, among other difficulties encountering a bitter cold wind, blowing directly from the summit with fearful velocity. Slower and slower we moved, until three o'clock, when two men fell in their tracks utterly exhausted. Here was a "pretty kettle of fish." Barely seven thousand feet up, with five thousand feet more above, and only one day in which to climb. It was finally decided to make camp on the nearest rocks, abandon all idea of reaching the summit, then, on the day following, find the best place possible for the illumination. Two thousand feet above timber line we camped on rocks, over which the cold wind swept, penetrating to the very marrow. Of course it was impossible to have a fire, and at night it was necessary to pile large stones on our blankets to keep them from sailing down the mountain. Hats and a few other things were anchored in like manner.

The "Glorious Fourth" was ushered in, clear and cold, while a patriot in the party, not to be outdone by Uncle Sam, saluted the rising sun with a deafening round of fire cracker artillery. At five o'clock we started on our upward march. Every thing was left behind except one hundred pounds of red fire, three

overcoats and a few crackers. At 11:30 A. M., bare rocks were found to the west of the summit, in what was considered a good location, and at an altitude of about ten thousand feet. Here our burdens were cast at the foot of the cliff, and all hands, except Keene and myself, returned to Government Camp. By noon the wind had died down entirely, and the day became very pleasant. While waiting at this lonely station for the appointed hour of illumination, a panorama was spread before us, of a scope and magnificence that cannot be appropriately described, but must be seen to be appreciated. Yes, and it remains for those who love the beautiful and grand sufficiently to scale mountains, to toil on day after day, patiently waiting for the time that is sure to come, when the glorious pages of Nature will be unrolled before them. Then,

> "It seems by the pain of ascending the height,
> We had conquered a claim to that wonderful sight."

The scene embraces millions of acres of land in Eastern Oregon, extending from the Cascades to the Blue mountains, a distance of over one hundred and fifty miles. The entire range of the Cascades lies before us, showing the foothills of both Eastern and Western Oregon, and the increase in height toward the center. For miles upon miles to the south, cross ranges, running from east to west seem piled one upon the other, and to their tops is added a covering of snow, changing the solemn, otherwise unbroken, dark green, to a variegated picture, not only of grandeur, but beauty. To the left of the centre stands Jefferson,

similar to Hood as seen from Portland. Next come the Three Sisters to the left of Jefferson, while still further stands Snow Butte. Almost in front of Jefferson is Washington, while to the right McLaughlin looms up in southern Oregon, two hundred and fifty miles distant. Changing the view to western Oregon, we see Mary's Peak over one hundred miles southwest. The Willamette valley can be seen through its entire extent of many miles, while here and there we catch glimpses of the river flowing on to the lordly Columbia. Along the western horizon extends the Coast Range, while in one little spot the mountains break way and give us a vista of the ocean. In the immediate foreground lies the base of old Hood, white with snow for five thousand feet below us. To witness a scene like this many a man would circle the globe;—and yet, imagine a sunset upon it. At 5 :30 P. M. clouds drifted from the north and hung on the points of the range a mile below. Slowly the sun sank to rest, while the clouds hovering over the western horizon became brighter and brighter, until it seemed that the very gates of heaven were thrown wide open, and over a scene of unrivaled grandeur was spread another of marvelous magnificence. As if Nature was not even yet satisfied with such dazzling beauty, suddenly the smoke that had gathered far below us, shutting out the great Columbia, was drawn aside and the waters of that river seemed, through the thin smoke remaining, like a stream of molten gold, visible in an unbroken line, winding from the mountain to the sea

a distance of one hundred and fifty miles. Then, too, as we looked, just beneath the setting sun, the Pacific ocean came to view, while the sun was setting in the mouth of the Columbia, reflecting its ruddy glare in the ocean and river at one and the same time. To the right could be seen Cape Disappointment, while to the left Point Adams showed with equal clearness. So closed the day and the night came on.

Far above the few clouds that lurked beneath us, threatening the success of our experiment, the atmosphere was so perfectly clear that we thought its equal had never been seen. Promptly with the departing day the full moon arose in all its beauty, changing the day's brilliance to a subdued halo of glory. About seven o'clock the wind blew furiously, almost carrying us from the rocks to the snow beneath. Although clad for a land of wintry blasts, it was necessary to pace back and forth, swinging our arms and jumping to keep warm. At eight o'clock the wind died down, and we became comfortable without exercise. Our spirits were low, however, for it seemed that the entire country was covered with a thick veil of smoke, and our labor was to be in vain. Suddenly at 9:30 we saw a red light in the direction of Portland. It was the signal for a complete revolution in our feelings. We danced for joy. Yes, we screamed and halloed until we were hoarse. Did all sorts of silly things, for now we *knew* our fire would be seen. Following the first light came another, and still others, and in our mad excitement we took a handful of red fire and burned it on a rock. "Thereby hangs a tale."

The members of our party at Government camp were gathered around a cheerful fire telling bear stories and waiting patiently for the appointed time, when they were startled by a brilliant light from the mountain, showing through the trees in front of them. Instantly they scattered, every member forgetting his companions in a wild scramble for a good view. In this sudden stampede, one member, who is hard of hearing, climbed a tree, where he remained until the others began to assemble. As one of the drivers, a hardy son of Erin, passed the tree and heard a rustling in the branches, he glanced up, saw a large, dark object, took it for a bear and gave the alarm. Instantly all hands gathered around the tree, every one armed with a club, which he swung like the arms of a windmill, at the same time shouting for some one else to get a gun. The man up a tree, not understanding why the commotion should extend so long after the burning of red fire, started to go down, but, was met with such a lively rain of clubs that he beat a precipitate retreat. At this point, a gun arrived and every fellow wanted to shoot the bear. Bruin, at last comprehending the situation, chimed in with: "You fellows let up with your durned foolishness, will you."

Soon after the red fire and rockets at Portland were noticed, others were seen at Prineville, seventy-five miles to the southeast, and also at Vancouver, W. T. These were watched with the most intense interest, until the time arrived to make our own novel show. The red fire was placed in a narrow ridge

about ten feet long, and at right angles with Portland. Holding my watch before me, promptly at 11:30 we applied the match with the result as shown by the following account in the *Oregonian* of the next day:

"The celebration closed with the illumination of Mount Hood, the grandest and most unique event of the day. Precisely at 11:30, the time appointed, just as the fireworks display was over, a bright red light shone away up in the clouds above the eastern horizon, which was greeted with cheers from the thousands congregated on the bridge, wharves, roofs, boats on the river and on the hills back of town, and with vigorous and long-continued whistling from every steamboat on the river.

"The mountain had been plainly visible all day, but toward evening a curtain of mist and smoke shut off the view at the base, and as twilight fell, the curtain rose higher till at last only the very peak could be seen, and as night came on, even that disappeared from view. Many gave up all hope of seeing any sign from the mountain. But many thought that the obstructions to a view of the summit were very slight, and if the party had reached the peak, the light from one hundred pounds of red fire would be able to pierce through them, and so it proved. It lasted exactly fifty-eight seconds. This was the most novel and the highest illumination ever made, and was seen the farthest and formed a fitting close to the celebration of 1887."

Immediately after the illumination we started

down the mountain, following our previous trail in the snow. Just after midnight, while lunging through the snow, we suddenly lost our footing and were no little astonished to find that we had fallen into a crevasse. It proved narrow and shallow, however, and all things considered, we extricated ourselves with remarkable celerity and passed on down the mountain side, only to get lost in the timber below, and wander around until daylight, when we found camp and soon after were homeward bound.

Crater Lake.

ONE OF THE WORLD'S GREAT NATURAL WONDERS.

A TRIP to Crater Lake is, to a lover of the grand and beautiful in nature, an important event, around which will ever cluster memories of unalloyed happiness, thoughts of little adventures and weird experiences that go to make life worth living. It is situated in the northwest portion of Klamath county, Oregon, twenty-two miles west of north of Fort Klamath, and about eighty miles northeast of Medford, which is the best point to leave the Oregon & California railroad. The Jacksonville and Fort Klamath military road passes the lake within three miles, and the road to the very walls of it is an exceptionally good one for a mountainous country, while in near proximity may be found remarkably fine camping grounds.

The Indians of Southern Oregon have known of it for ages, but until recently none have seen it, for the reason that a tradition, handed down from generation to generation, described it as the home of myriads of sea-devils, or, as they were called, Llaos; and it was considered certain death for any brave even to look upon it. This superstition still haunts the Klamaths. While a few of the tribe have visited

it, they do so with a sort of mysterious dread of the consequences. It was discovered by a party of twelve prospectors on June 12th, 1853, among whom were J. W. Hillman, George Ross, James Louden, Pat McManus, Isaac Skeeters and a Mr. Dodd. These had left the main party, and were not looking for gold, but having run short of provisions, were seeking wherewithal to stay the gnawing sensations that had seized upon their stomachs. For a time hunger forsook them, as they stood in silent amazement upon the cliffs, and drank in the awe of the scene stretched before them. After partaking of the inspiration fostered by such weird grandeur, they decided to call it Mysterious, or Deep Blue Lake. It was subsequently called Lake Majesty, and by being constantly referred to as a crater lake, it gradually assumed that name, which is within itself so descriptive.

At times when gazing from the surrounding wall, the skies and cliffs are seen perfectly mirrored in the smooth and glassy surface over which the mountain breeze creates scarce a ripple, and it is with great difficulty the eye can distinguish the line dividing the cliffs from their reflected counterfeits. The lake is almost egg-shaped, ranging northeast by southwest, and is seven miles long by six in width. The water's surface is six thousand two hundred and fifty-one feet above sea level, and is completely surrounded by cliffs, or walls, from one thousand to over two thousand feet high, which are scantily covered with coniferous trees. To the southwest is Wizard Island, eight

hundred and forty-five feet high, circular in shape, and slightly covered with timber. In the top is a depression, or crater—the Witches' Cauldron—one hundred feet deep and four hundred and seventy-five feet in diameter. This was evidently the last smoking chimney of a once mighty volcano. The base of the island is covered with very heavy and hard rocks, with sharp and unworn edges, over which scarcely a score of human feet have trod. Farther up are deep beds of ashes, and light, spongy rocks and cinders, giving evidence of intense heat. Within the crater, as without, the surface is entirely covered with volcanic rocks, but here it forms one of the hottest places on a clear day in August, it has ever been my lot to witness. Not a breath of air seems to enter, and the hot sun pours down upon thousands of rocks and stones that reflect his rays with an intensity that seems to multiply beyond conception. Here, however, we determined to lunch—and did—but one such experience will last a long time. Directly north of the island is Llao Rock, a grand old sentinel, standing boldly out on the west side of the lake and reaching up over two thousand feet perpendicular. From the top of it you can drop a stone and it will pass down and grow smaller and smaller, until your head begins to swim and you see the stone become a mere speck, and fade entirely from view; and at last, nearly half a mile below, it strikes the unruffled surface of the water and sinks forever from sight in the depth of a bottomless lake.

There is probably no point of interest in America that so completely overcomes the ordinary Indian with fear as Crater Lake. From time immemorial, no power has been strong enough to induce him to approach within sight of it. For a paltry sum he will engage to guide you thither, but, before you reach the mountain top, will leave you to proceed alone. To the savage mind it is clothed with a deep veil of mystery, and is the abode of all manner of demons and unshapely monsters. Once inhabited by the Great Spirit, it has now become the sheol of modern times, and it is certain death for any proud savage to behold it. This feeling has, to a certain extent, instilled itself in the mind of such whites as have made it their Mecca, until every stray log that floats upon the water is imagined to possess life, and may possibly be a monster. Exaggerated accounts of different points have been given and implicitly believed without a question or reflection. It has been claimed that the crater was eight hundred feet deep, while by actual measurement we found it to be scarcely a hundred. The island was said to be fifteen hundred feet high, but an accurate measurement placed it at just eight hundred and forty-five feet.

From Allen Davey, Chief of the Klamath tribe, I gleaned the following in reference to the discovery of Crater Lake:

A long time ago, long before the white man appeared in this region to vex and drive the proud native out, a band of Klamaths, while out hunting, came

suddenly upon the lake and were startled by its remarkable walls and awed by its majestic proportions. With spirits subdued and trembling with fear, they silently approached and gazed upon its face; something within told them the Great Spirit dwelt there, and they dared not remain, but passed silently down the side of the mountain and camped far away. By some unaccountable influence, however, one brave was induced to return. He went up to the very brink of the precipice and started his camp fire. Here he laid down to rest; here he slept till morn—slept till the sun was high in air, then arose and joined his tribe far down the mountain. At night he came again; again he slept till morn. Each visit bore a charm that drew him back again. Each night found him sleeping above the rocks; each night strange voices arose from the waters; mysterious noises filled the air. At last, after a great many moons, he climbed down to the lake and there he bathed and spent the night. Often he climbed down in like manner, and frequently saw wonderful animals, similar in all respects to a Klamath Indian, except that they seemed to exist entirely in the water. He suddenly became hardier and stronger than any Indian of his tribe because of his many visits to the mysterious waters. Others then began to seek its influence. Old warriors sent their sons for strength and courage to meet the conflicts awaiting them. First, they slept on the rocks above, then ventured to the water's edge, but last of all they plunged beneath the flood and the

coveted strength was theirs. On one occasion, the brave who first visited the lake, killed a monster, or fish, and was at once set upon by untold numbers of excited Llaos (for such they were called), who carried him to the top of the cliffs, cut his throat with a stone knife, then tore his body in small pieces, which were thrown down to the waters far beneath, where he was devoured by the angry Llaos—and such shall be the fate of every Klamath brave, who, from that day to this, dares to look upon the lake.

My first visit to Crater Lake was in 1885, at which time the thought was suggested by Capt. C. E. Dutton, of having the lake and environs drawn from the market. Promptly acting on the suggestion, my friend, Hon. Binger Hermann, was sought and a movement started looking to the formation of a National Park. In response to a petition forwarded to Washington and ably advocated by Congressman Hermann, the United States Geological Survey, under Capt. Dutton, was ordered to examine the lake and surroundings during the summer of 1886. In this expedition it was my good fortune to have charge of the sounding, which afforded me a pleasure unsurpassed in all my mountain experience.

That an idea may be had of the difficulties to be overcome, suffice it to say, boats had to be built for the purpose in Portland, transported to Ashland, three hundred and forty-one miles by rail, and carried from there to the lake on wagons, one hundred miles

into the mountains, where they were launched over cliffs one thousand feet high.

On the first day of July, I boarded the train for Ashland, where I met Capt. Dutton, and we were joined immediately afterward by Capt. Geo. W. Davis, one of the most eminent engineers of America, and ten soldiers. On the 7th, we started for the lake, preceded by Capts. Dutton and Davis, who were followed by a four mule team, bearing a first-class lap streak boat, which in turn was followed by three double teams, horsemen and pack train. Of our largest boat, the Cleetwood, we all felt justly proud, as it was certainly a beautiful model, four-oared, twenty-six feet long and competent to ride almost any sea.

When passing through Phœnix, the typical and irrepressible critic came to the surface, in the shape of a lean, lank, awkward, ignorant country boy of, say, eighteen summers. With hands in his pockets, he aided the single suspender delegated to hold his breeches in place, and when shifting a monstrous chew of tobacco over his tongue, informed his audience (of half a dozen small urchins) that "That 'ere boat won't live in Crater Lake half an hour if a storm comes up. It ain't shaped right. Jist see for yourself how sway-backed it is. It must have been made by some feller as never seed a boat afore." This brings to mind the fact that a critic is a person who finds fault with something of which he is densely ignorant.

The entire distance from Ashland—ninety-seven miles—was accomplished by slow, easy marches, every

precaution being taken to provide against a mishap, and no incident occurred of special importance. Soon after reaching the foothills, we encountered sliding places and short turns in the road. As the wagon containing the Cleetwood was top heavy and coupled twenty feet long, it was impossible to turn on an ordinary curve, hence it became necessary at times to drive as far as possible, then let ten or fifteen men lift the hind end of the wagon around by main strength. When a sidling place was reached, the men would hang on the upper side, or attach ropes to the top and hold it, thus preventing an upset. On Tuesday we succeeded in reaching the foot of the last grade, and on Wednesday morning began the ascent. Here was the rub. The hill is about a mile and a half long, very steep, sideling, rocky, and filled with roots and stones, added to which were great banks of snow, packed solid by constant thawing. Progress was slow and tedious, a roadway having to be cut in places, while men with picks, axes and shovels dug up rocks, cut down trees and shoveled snow, besides building up or cutting down one side of the roadway. At 10 o'clock on Wednesday the 14th, the boats were landed on the walls of the lake, having traveled four hundred and forty miles from Portland, with scarcely a scratch to mar the paint.

Thursday morning the work of launching was commenced by covering the bottom of each skiff with inch boards, firmly secured, as also a shield in front of the bow. They were carried to the lowest place

to be found in the cliffs, probably about nine hundred feet, vertical measurement, where a canyon descends at an angle of thirty-five or forty degrees, when a three-quarter inch rope was attached and in turn passed around a tree on the summit, where a man was stationed to manage it, directed by signals below. One was lowered at a time, accompanied by four men to guide and handle it. Besides this, men were stationed at different points to signal to the top, and thus regulate the paying out of rope. Every effort was made to send all loose stones on ahead, to prevent accident from above, yet, before the first boat had proceeded three hundred feet in its descent, a boulder came rolling from near the summit with increasing velocity, and before any one realized the danger, had struck a rock in near proximity and bounded over the skiff, passed between the men and within an inch of one fellow's head. Before the descent was completed, the boards were torn from the first boat; but extra precaution was taken with the second one. About two-thirds of the way down a perfect shower of rocks came tumbling from a cliff to the left, but, strange as it may seem, they either bounded over or around the men and boat, so that no damage resulted. At three o'clock the first skiff reached bottom somewhat scratched, but not injured in any manner. The second one was placed in the lake entirely uninjured at six o'clock P. M.

Our tents were pitched in a beautiful spot. In the immediate foreground to the north lies the lake with

its twenty odd miles of rugged cliffs standing abruptly from the water's edge. To the left is Wizard Island, on the top of which rests the Witch's Cauldron, or crater, like a great flat top; beyond stands Llao Rock, solemn, grim and grand, over two thousand feet perpendicular, while still beyond stands Mt. Thielsen, the lightning rod of the Cascades. Just to the east of the lake is Mt. Scott, partly covered with snow, while close to the camp on the east, is a high cliff known as Cathedral Rock, running far down to the right and at last disappearing below the tree tops. To the south the scene was varied by a wide range of mountain tops, stretching far away to California, chief among which is snow-capped and beautiful Pitt. Just to the left the rough mountain view is changed to a charming plain, in the midst of which is a broad expanse of water, which proves to be Klamath Lake, about thirty miles distant. Thursday evening, dark and threatening clouds were suddenly seen to approach from this point, accompanied by vivid flashes of lightning and loud peals of thunder. A few large drops of rain had fallen, when there was a sudden outburst of joy in camp, as every one glanced at the sides of Cathedral Rock, which were suddenly illuminated by a light of deep orange. To the west, the sun was slowly sinking to rest, when a glowing light spread itself over the dark clouds, which became brighter and still brighter. Looking beyond a scene of unparalleled magnificence was spread before us. Through the center hung long fleecy clouds lighted to a deep

orange, while above, like a great curtain, was spread a belt of olive green. Here and there were tints of crimson, the delicacy of which no artist could approach. Above and parallel with the horizon stretched a long rift, in clouds rendered marvelously rich in gold and garnet, through which the blue sky beyond was visible, slightly obscured by light, fleecy clouds of silver. During all this magnificent sight the electric storm raged in the south with unabated fury, flashes of lightning and peals of thunder adding solemnity to a scene of wonderful brilliance.

The 16th was spent in preparing the Cleetwood for her final plunge over the cliffs in search of water. A sled was made of very heavy timbers, on which she was placed, keel up, then lashed and braced in every conceivable manner until, in fact, she seemed a part of the sled itself. Guy ropes were placed on each corner to guide it, in connection with a heavy handspike. Saturday morning the actual work of launching began, by sliding the boat over a snowdrift in a canyon that slopes to the lake at about an angle of fifty degrees. The cliff is probably one thousand feet high at this point. The sled was attached by block and tackle to a tree on the summit and lowered nearly half way, when the bearing was shifted as far down as possible and a new start taken. Leaving the summit at 7:30 A. M., it required the most persistent work and constant care of fifteen men eight hours to reach the lake. In the bottom of the canyon flows a stream of water that contributes very

materially to the danger of such an undertaking, as constant slides of rocks are thus caused. When the bottom seemed to be reached it was found that there still remained a sort of jump-off, or slide, into the water, perpendicular and about fifteen feet high. The water, at this point is very deep, and the question arose, "How shall we launch the boat now that we have got it here?" It was simply turned right side up again, lashed to the sled and let partially down with the bow thrown out as far as possible. It was held securely in this position while one of the men climbed aboard, cut the lines and she shot forward in fine style, not shipping a gallon of water, although the bow was almost submerged to start with. The moment the launching was complete there was a cry of unrestrained joy sent up from all present, and our shouts were answered from the cliffs by waving of hats and blowing of fog horns. With one impulse the cry was raised, "Now for the island!" and in an incredibly short space of time both skiffs and the Cleetwood were headed that way. With four men at the oars we soon reached our destination, and then returned to camp, where a bountiful repast awaited us.

Every precaution was taken to clear the canyon of loose rocks, nevertheless a few rolled down, but were successfully dodged until the boat was actually in the water, immediately after which a small bowlder came down with terrific force. Capt. Davis stood directly in its course, and not seeing it the other members of the party shouted to him to "lookout." It being im-

possible for him to run, he jumped under the frame-work, or sled, hanging where the boat left it, and laid flat on the ground, just as the stone struck a rock and the upper end of the frame. It then struck Capt. Davis in the back, but its force had been so broken that it did no harm further than to make the spot feel sore.

The day after launching the Cleetwood, nine members of our party made the circuit of the lake on a sort of casual observation, or tour of inspection. The scenery was grand to a degree far beyond our most sanguine expectations. Four strong oarsmen soon brought us to Llao Rock, and as we gazed in silent wonder at its rugged sides, reaching nearly half a mile above us, for the first time did we realize the immensity of such a spectacle. Never before did I fully understand the meaning of figures when they run up into the thousands of feet, vertical measurement. Beyond Llao rock we found a beautiful little bay, and beyond it a larger one, probably one mile long by a quarter of a mile deep. Here we stopped for lunch, and when landing were surprised to find a long line of dead moths, of large variety, washed up by the waves, and in such numbers that the air was laden with an unpleasant odor, apparently about a first cousin to a slaughter house. We also found here a narrow beach of small gravel running almost the entire length of the bay, while further out in the lake, the bottom is composed of sand. As this point had not only never been named, but probably was never before visited by human beings, we decided to christen it

Cleetwood Cove. Passing on our journey, it was soon seen that the cliffs on the north side are not so high as those to the south. In several places it appeared that good trails could easily be made to the water's edge, over which a person might almost ride horseback, and in one place, without any grading whatever, a good pack train could descend with comparative ease. About 2 o'clock a thunder shower came suddenly upon us just as two beautiful grottos appeared in view. Into one of these the boat was run, where we were entirely beyond the reach of rain. It proved to be about thirty feet deep and twenty wide, with an arched roof probably eight feet above the water, while the rocky bottom could be distinctly seen ten feet below the surface. So perfect was its form that it almost seemed the hand of man had hewn it from the solid rock. Beyond it towered an immense cliff, very high, with broken, rugged sides, picturesque and sublime, which I insist on naming Dutton Cliff, in honor of Capt. Dutton, who has done and is doing so much to make Crater Lake justly famous. This point may be known from the fact that it lies directly opposite Llao Rock, and between the two lowest places in the lake's walls. Immediately north of Dutton Cliff, the elements have worn the sides of the mountain, leaving a harder substance, alternately colored red and yellow, resembling the mansard roof of a cottage, while in one place, tall red chimneys stand aloft, making, all in all, such a scene that Cottage Rock could scarcely be improved on for a name. Lying between the two

points above referred to, a break in the wall was found, that is almost perpendicular, but certainly does not exceed five hundred feet in height. This is by far the lowest point in the walls.

No time was lost in getting our soundings under way. The first was made about one hundred yards from shore. It was supposed that we might possibly find as much as one hundred feet of water, but, as the lead ran out, our excitement grew with each succeeding hundred feet, until over one thousand two hundred feet were out. At one thousand two hundred feet the machine stopped, and our pent-up feelings exploded in one wild yell of delight. For a number of days the soundings were continued. The greatest depth recorded was one thousand nine hundred and ninety-six feet, which, making allowance for stretch of wire, would give two thousand and eight feet. Of the whole number made, eighteen are over one thousand nine hundred, thirteen over one thousand eight hundred, eleven over one thousand seven hundred, fifteen over one thousand six hundred, and nineteen over one thousand five hundred. It was found that at the bottom of the northeastern end lies a plain of several square miles, almost perfectly level, while south of the center is a cliff about nine hundred feet high, and west of the center seems to be cinder cone, nearly one thousand two hundred feet in height, with a crater in the center two hundred and fifty feet deep. Its summit is six hundred feet below the surface of the water.

On one occasion our party took five pounds of red fire, which we intended to burn on the summit of Wizard Island, but owing to the fact that the air was so filled with smoke as to destroy the effect, our plan was changed, and we took it to Rogue River Falls on our return. Here we met quite a number of hardy mountaineers, and at 9 o'clock left camp for the falls, about one mile distant. The night was very dark, and a weird sort of a scene it was as we climbed over logs and rocks, lighting our way by tallow candles and a lantern that flickered dimly. At last the bank of the stream was reached, and while the noise of the rushing waters was intense, nothing could be seen but the dim outline of something white far down below us. At this point, the walls are perpendicular, and one hundred and eighty feet high. They are also solid rock from top to bottom. Directly opposite where we stood, Mill Creek falls into Rogue River (one hundred and eighty feet), and this is what we came to see. In order to get the benefit of the red light, it was necessary for some one to climb down to the water. This duty fell to a stranger in the party, who made the descent during the day, and myself. He led the way carrying a dim lantern, and I followed as best I could. The rocks are covered with a remarkably thick layer of moss, which is kept very wet by the rising mist. The path, if such it might be termed, led along the sides of the cliff at an angle of about 45 degrees. As we cautiously climbed from rock to rock, it was a sort of feeling of intensified interest that overcame us, when

we realized that a single misstep would precipitate us to the rocks below—and, worst of all, possibly we "never would be missed." The bed of the stream was reached at last, and the fire ignited close to the falls. Ye gods! What a transformation! Suddenly, the canyon, which could not be seen before, was as bright as day, lighted by a fire so brilliant that we could not look upon it. Crimson air and crimson water, crimson walls and crimson everywhere. No magician of the Arabians ever conjured up by a stroke of his wand a spectacle more sublime. It was one of transcendent beauty, upon which the human eye seldom rests, and when it does its possessor is spellbound by the bewildering vision. One almost loses the power of speech in the desperate struggle to see and comprehend the scene, and before it is realized the light dies away and darkness reigns supreme, rendered ten-fold more dense by the splendor of so magnificent a tableau.

Near the base of Dutton Cliff stands a solitary rock, probably one hundred feet high, by two hundred in length and nearly the same breadth, that, while not seen by the present generation of Indians, is nevertheless known to them, and is a special object of superstitious dread. They consider it as a peculiarly ferocious monster, but are unable to describe its characteristics. It stands in the lake entirely alone and about fifty yards from shore. Standing on the cliffs, five miles to the west and looking across the lake, this strange rock is plainly visible in the sunlight its rugged peaks reaching aloft, giving it the ap-

pearance of a full rigged ship at anchor. Should a cloud pass before the sun, as the shadow strikes the rock it will pass from view as effectually as though it had ceased to exist. While sounding the lake in 1886, I caused a party of topographical engineers to be landed here for observations, but it was so rugged that the most diligent search failed to reveal a level place large enough to accommodate the tripod attached to their instruments, and we were compelled to resort to a point on shore for the purpose. I have never learned its Indian name, but among the whites it is known as the Phantom Ship.

To those who enjoy the noble sport of hunting, the vicinity of Crater Lake is especially attractive. Great numbers of deer, bear and panther roam through the timber in fancied security, inviting the keen eye and steady nerve of the sportsman. Although passionately fond of such sport myself, the grandeur and sublimity of the surroundings so overcame me with desire to see and prosecute our explorations, that I forgot my love for a running shot, in an inordinate desire to climb over the cliffs and view the wonderful place from every conceivable point. My companions were no less affected, and the result was that we ran out of meat and applied to a native sheep herder for mutton chops. He scowled upon us for a moment, then informed our spokesman that "when he butchered he never saved the heads."

While running a line of soundings from Llao rock to Vidae cliff across the lake one day, a strong wind

sprung up from the south accompanied by black clouds and a storm seemed imminent. We had proceeded about three miles across, when we were suddenly startled by a loud noise, as though a multitude of men were savagely beating tin pans. In a very few minutes the southwestern cliffs became white and we could plainly see the "color line" advancing to the north, until all the cliffs to the west seemed covered with snow. To add to so strange a sight, a good-sized water-fall began pouring over Llao rock, and falling to the lake two thousand feet below. Within half an hour from the beginning of the storm, the water-fall ceased, the cliffs became dark again, the wind shifted to the northwest and drove millions of hailstones upon us, sufficiently large to make us wince when struck—especially when struck all over with no possible means of escape.

The only accident to any of our party during the sojourn, befel a highly respected mule attached to the Topographical Engineers Corps. One day as the party passed along the east side of Dutton Cliff, progress seemed almost blocked by high precipices. A point was found overlooking a yawning chasm, where a large tree had fallen and lodged. By throwing in stones and brush, a sort of trail was made to terra firma beyond the backbone of the mountain. Over this the pack train was passed safely, except a mule that was blind in one eye. He bore a reputation for dignity and sobriety that any well-to-do mule might envy. However, when just at the point which, above

all others, should have received his undivided attention, he became gay and festive, and as a consequence, fell part way over the precipice. By dint of hard labor, he was drawn back, but little the worse for wear, his pack was removed and he again started across. Again, however, he became frisky, and pitched head-long over a rocky precipice five hundred feet high. As his limbs mixed with those of the trees below, the thoughts of the spectators above were: "There goes all that is mortal of Croppy, who climbed to the top of Mt. Shasta, but died in a lonely canyon, by his own hand in a fit of temporary insanity. Let him R.I.P."

One day while at work on the lake, my attention was called to what seemed to be a tall, full-bearded man standing on the southern portion of Llao Rock's summit. One foot was placed a little forward of the other and the knee bent slightly but naturally, while before him stood a gun. His hands were clasped over the muzzle as he gazed intently to the north. Just behind him stood a boy, apparently about fifteen years of age. They seemed entirely too natural not to be flesh and blood, and yet, persons at that distance would not be visible to the naked eye, as we were two miles out on the lake. Day after day, as our work progressed, their position remained the same, and, in the absence of a better explanation, we decided them to be trees.

Crater Lake is but a striking memento of a dread past. Imagine a vast mountain, six by seven miles

through, at an elevation of eight thousand feet, with the top removed and the inside hollowed out, then filled with the clearest water in the world, to within two thousand feet of the top, then place a round island in one end eight hundred and forty-five feet high, then dig a circular hole tapering to the center, like a a funnel, one hundred feet deep and four hundred and seventy-five feet in diameter, and you have a perfect representation of Crater Lake.

It is hard to comprehend what an immense affair it is. To those living in New York City, I would say, Crater Lake is large enough to have Manhattan, Randall's, Ward's and Blackwell's Islands dropped into it, side by side without touching the walls, or, Chicago or Washington City might do the same. Our own fair city of Portland with all her suburbs, from the City Park to Mount Tabor, and from Albina to Sellwood inclusive, could find ample room on the bottom of the lake. On the other hand, if it were possible to place the lake, at its present elevation, above either of these cities, it would be over a mile up to the surface of the water, and a mile and three-quarters to the top of Llao Rock. Of this distance, the ascent would be through water for two thousand feet. To those living in New Hampshire, it might be said, the surface of the water is twenty-three feet higher than the summit of Mt. Washington.

What an immense affair it must have been, ages upon ages ago, when, long before the hot breath of a volcano soiled its hoary head, standing as a proud

1. *Rogue River Falls, 180 feet high.*
2. *Vidae Cliff, Crater Lake, over 2,000 feet high.*
3. *A point on Vidae Cliff.*

monarch, with its feet upon earth and its head in the heavens, it towered far, far above the mountain ranges, aye, looked far down upon the snowy peaks of Hood and Shasta, and snuffled the air beyond the reach of Everest. Then streams of fire began to shoot forth, great seas of lava were hurled upon the earth beneath. The elements seemed bent upon establishing hell upon earth and fixing its throne upon this great mountain. At last its foundation gave way and it sank forever from sight. Down, down, down deep into the bowels of the earth, leaving a great, black, smoking chasm, which succeeding ages filled with pure, fresh water, giving to our day and generation one of the most beautiful lakes within the vision of man.

In conclusion I will say, Crater Lake is one of the grandest points of interest on earth. Here all the ingenuity of nature seems to have been exerted to the fullest capacity, to build one grand, awe-inspiring temple, within which to live and from which to gaze upon the surrounding world and say: "Here would I dwell and live forever. Here would I make my home from choice; the universe is my kingdom, and this my throne."

Josephine County Caves.

ON Friday evening, August 24, 1888, S. S. Nicolini of Ragusa, Austria, E. D. Dewert of Portland, and the writer boarded the south-bound train for Grant's Pass, intent on a few days' outing. This town of Grant's Pass was so named for a pass in the mountains several miles south, where, in early days, the silent hero camped for the night.

Early Saturday morning my head was banged up against one end of our sleeping car, an instant after hearing the shrill whistle sounding down brakes. As soon as possible I got on the outside and found the engines standing within a few feet of a yawning chasm where a bridge had been. Now, however, seven bents had been burned away and a terrible railroad accident was averted by the quick eye of Engineer Elliott, who saw the fire as we turned the curve and stopped the train almost instantly.

At Grant's Pass, H. D., M. M. and F. M. Harkness joined us, and we started for the Josephine County Caves, about thirty miles due south, in the Siskiyou mountains. For twenty miles the trip was made over a very good road by wagon. At this point it became necessary to pack our things on two horses and walk over a trail into the mountains. On a hot day, this

portion of the trip is very laborious, owing to the fact that it is up the steep mountain side about two-thirds of the way, and down an equally steep incline the remainder. We arrived at our destination a little before noon on the 27th, and found two openings, one above the other, and about one hundred yards apart, on the south side of a deep canyon. When out hunting a few years since, Elijah Davidson, of Williams Creek, found a bear and chased it into the lower entrance, thus discovering the caves.

Each entrance is high enough to admit a person without stooping, and is probably about eight feet wide. At noon we entered the upper cave. For a few feet the floor inclined inward; we then descended a ladder for about six feet, and found ourselves in a passage way eight feet wide by an equal height, which changed, however, at every step. Now it would be wider, and now narrower, now higher, and now lower. Walls, ceiling and floor were composed of solid rock. To describe them, appropriately would simply be to use a gift made divine by inspiration. No man can behold them, then impart to others an accurate idea of their appearance. Soon after entering we were compelled to progress on hands and knees, then stood upright in chambers ten feet high, the walls of which were white. Stalactites were first seen here, and involuntarily we cast sly glances around to discover the bodies of kings preserved beneath such droppings in "King Solomon's Mines." We wandered from place to place, from chamber to chamber, dragging ourselves

through passage ways barely large enough to admit a human body, while with toes and fingers we worked along, or stood in the midst of rooms that reached far above us. Now we see a beautiful pool of clearest water, surrounded by a delicate crystal formation in the shape of a bowl. In color it is as white as the driven snow, while each crystal is oblong, projecting at right angles with the main portion for about an eighth of an inch. One peculiarity of these crystals that disappointed us was the fact that they change from white to a dull, yellowish color, immediately after being removed from the caves.

We were extremely anxious to try a new process for taking photographs in the dark, so Dewert took his camera and acted as photographer for the party. Owing to the limited space at times and cramped manner of locomotion it required the services of four men to carry the camera and acompanying necessities. Having reached a suitable place for a picture, the camera was first put in position, a board was laid on the top of it on which a tin reflector was placed, and a little powder called the lightning flash was then poured on the board in front of the reflector. At this point the order was given, "Douse the glim," and all lights were extinguished. The plate was exposed in perfect darkness, the powder was ignited, and instantly there was a flash of the most intense light. This light was so brilliant that, for several minutes, it caused in the eyes a glimmering sensation of light. Several photographs were taken in this way, which

will doubtless prove excellent examples of what ingenuity can do in the dark.

It would require days of constant work to explore all the passages we found, whereas our time was limited to that portion of one day after 12 o'clock noon. For this reason we remained in the caves from noon to midnight, first examining the upper, then the lower one. This difference exists between them: The one above is possessed of fine stalactite formations, while below none appear. Instead, however, immense rocks are piled indiscriminately one upon the other, with great cracks between. Long ladders were used to climb to the top of the rocks, over the sides of which yawning pits could be seen that seemed to possess no bottom. Lack of time alone prevented us from making a thorough investigation, but I could not resist the temptation to climb over the side of one friendly rock for a few feet to see how it looked. Down for twenty feet the space remained unchanged, so that I could easily reach from rock to rock. It then widened out and I could proceed no farther without ropes, so I returned to the party. A fine stream of clear cold water flows from this cave and a strong breeze of cool air rushed forth also. At times in both upper and lower cave, the wind blew toward the entrance so that it was impossible to keep the lights burning. No traces of foul air have been found in either cave.

Before our visit, visions of square chambers filled my mind, only to be dashed aside when real ones presented themselves, the irregular shape of which could

not well be surpassed. There are no parallel walls, few straight ones, but corners everywhere The floor will pitch in all directions, likewise ceiling and walls. Beautiful views of stalactites and stalagmites stand out in bold relief against snow white walls. At the farthest extremity of the upper cave in one direction an immense chamber presents itself, and should be known as the devil's banquet hall. It is probably 75x150 feet and sixty in height. Great blocks of rock hang as by a thread from the ceiling, while on every side rocks of equal size lie in all conceivable shapes. Standing at the point of entry one looks at the opposite side and sees great cracks, yawning cavities with open mouths of blackness, dismal shadows, to which flickering lights give a ghoulish, dance-like appearance. Yes, the devil seems to be holding high carnival, while his imps would dance the night away. They bob up and down and swing their arms in fiendish glee, while the dance goes on forever. None can look therein without seeing these imps and their antics. The floor recedes rapidly from the entrance, and is composed of great rocks scattered in confusion. We placed a number of lighted candles in different places, then climbed to the opposite side to view them. The shadows had partially disappeared, crevices and holes in the walls not before seen became suddenly black and excited our curiosity, so we climbed over high rocks into unknown passages. In a small chamber on one side we found a beautiful stream of water, falling several feet into a crystal basin. The walls

of the chamber are white, and the effect by candle-light is very fine.

Midnight found us still employed, but we reluctantly ceased our labors and withdrew. Without unnecessary ceremony we wrapped our blankets about us, laid down beneath the stars, and slept the sleep of the just until 3 o'clock, when the dulcet notes of a coyote called us to the business of the day. Preparations were quickly made for the journey, and at daylight we were on our way to Grant's Pass, where we arrived at 9 o'clock P. M.

Our Mountains in War.

IT IS a curious fact that the home of Liberty has always been in the mountains. The reason for this is, that Nature intervenes every barrier to prevent conquests, and shields the native mountaineer from onslaughts of a foreign foe. The ringing words, "Make way for Liberty," could never have become immortal had it not been for a mountain pass. The memory of William Tell would not now be cherished by liberty-loving Swiss, were it not for the friendly crags of the Alps that sheltered him. Here in the Northwest we are blessed with a wonderful mountain range, extending from California through Oregon and Washington to British Columbia.

For beauty, grandeur and extent it has no superior; while as a field of defense, it simply stands unparalleled, and is rich in minerals, agriculture and commerce. Located at from forty to a hundred miles apart are the following mountain peaks, covered with perpetual snow: Baker, Rainier, Adams, St. Helens, Hood, Jefferson, Three Sisters, Pitt and Shasta. From each of these, convenient points of prominence are visible in the Coast Range, one or more of which in turn are visible from every harbor and city as far south as San Francisco. In case of a foreign war it is one of the possibilities of the Oregon Alpine Club to

organize a sort of Signal Corps, say five hundred men, each of whom would be thoroughly familiar with every pass, crevasse and crag in the mountains where detailed for service. With a liberal supply of provisions and ammunition on each peak, scarcely anything short of a pestilence could dislodge them. What could a foreign army do around Mt. Hood, for instance, with fifty resolute men well armed and equipped on the summit.

It has been but a few years since the entire force of the United States Army was successfully defied by Captain Jack and a dozen Indians in the Lava Beds; and yet we have here every advantage of the Lava Beds, to which is added precipices to the north, east and west, while to the south a narrow passage would permit men to ascend, but it is necessary to cut every step in the ice; while directly across the base of this precipitous glacier, a crevasse extends, of unknown depth, which varies in width from three to forty feet, according to the season. It is needless to say that every wounded member of the assaulting party would pay the penalty with his life, for the slightest misstep would hurl him into the crevasse where "moth doth not corrupt and where thieves do not break through and steal." Now for the point of this article. Give to the corps a liberal supply of heliographs and instruct the men how to use them. In this way a perfect system of communication can be established by which messages can be sent from point to point in an instant. Say, for instance, that a hostile fleet was

lying at Victoria and a descent on San Francisco was planned. From a spy within the enemy's lines, the party on Mt. Baker gathers full particulars, and im-immediately informs San Francisco of the contemplated attack, giving full particulars, including number of ships, men and guns.

Night on the Summit of Mount Rainier.

MONDAY, August 14, 1889, Mr. J. Nichols, of Tacoma, and the writer, left Tacoma for Mt. Rainier, determined, if possible, to reach its highest point.

The provisions, blankets, alpine stocks (a hickory staff seven feet long with a steel point at one end), alpine ax and all that was necessary in making the ascent easy, were taken from Tacoma, while pack horses were procured at Yelm, a station twenty-five miles south of Tacoma, and from which the trail leads eastwardly to Mount Rainier. It first follows river bottoms, then mountains, ridges and river bottoms again, while an occasional fording of the glacial stream, lends interest to the ever-changing scenes. We aimed at the end of each day to camp where feed could be obtained for hard working horses. Darkness coming on as we reached the first ford, left in some doubt the exact location of the crossing, so camp was made on the bank of the river with nothing but oats for our tired horses. Daylight found us fording the river, which had risen during the night about ten inches, making it quite exciting as the foaming water splashed the horses' sides, and wet our feet and ankles.

Stopping at the first place where hay could be had, a stay of nearly two hours was made for breakfast for ourselves and horses.

From our last night's experience, we decided to carry hay with us and camp wherever night should overtake us, which was at the foot of a high mountain our trail led over, and on the bank of the river as before. The day was uneventful, if we omit mention of the many hornets' nests we passed through and the four pheasants which fell before the unerring aim of Nichol's rifle. The pheasants led us to a fitting close of the day in the shape of pheasants and dumplings, prepared by the writer and pronounced by Nichols (who, by the way, is an epicure) to be simply *par excellence*. And here I might add that the writer is a single man.

The end of the third day found us at the Hotel Longmire at Hot Springs, located on the southwest slope of Mt. Rainier, at an altitude of three thousand feet, and some five miles from the perpetual snow limit. And no finer people ever lived than Mr. and Mrs. Longmire, who own and preside over the hotel and springs. The hotel material was cut by hand out of the finest grained cedar that ever grew—boards twelve inches wide and fifteen feet long—as perfect as though sawed.

As a matter of information for those interested, it might be well to say here that the waters of the springs are positively life-giving. The writer has visited many mineral springs, and has never seen anything that will compare with the stimulating and health-giving qualities of these springs.

But, to resume: we left the springs next morning, with a single pack horse, expecting to leave the horse at the top of the ridge (eight thousand feet altitude) overlooking Paradise valley, and, with blankets on our backs, to make our way to Ewing's camp, ten thousand five hundred feet above sea level. We reached Paradise valley, and, finding the same had been so well and truly named, decided to stop till next day and enjoy some of its beauties. Accordingly, camp was pitched, fire-wood gathered, and a camp fire built, and a pot of beans placed thereon. After a light lunch we strolled, enjoying the alpine beauties of the valley, well named Paradise.

During the afternoon the wind changed to the southwest, and clouds gradually spread over the firmament. From our experience a year ago on Mount Hood in a storm, at no higher altitude than we now were, no thought was given to ascending higher till fair weather and a northwest wind prevailed. Morning dawned and no indications of good weather. Our spirits were accordingly depressed. Observing the barometer, we found it moving quite rapidly in the direction of storm. By noon the sky was heavily overcast, and an hour later undercast as well.

By 3 o'clock rain began to fall. The wind had already risen to quite a gale. Re-staking our tent, digging a ditch around the head and sides, and piling wood and rocks along the edges to keep out the wind and rain, we crawled into our blankets and awaited developments. Soon the storm broke upon us with

all its alpine fury, and raged during the entire night. By morning the rain had turned into sleet and snow, the thermometer, at daylight registering 34 degrees. Shortly the storm ceased. After some difficulty a fire was started and coffee made. Sampling our pot of beans, which had boiled at least four hours, we found them still hard; after an hour more boiling we emptied them on the ground, having learned that beans are hard to cook at an eight thousand foot altitude. Our barometer still indicating foul weather, we decided to start at once for a more congenial climate. Accordingly our shivering horses (which we had blanketed) were packed and four hours later we were at the Springs hotel, in a rather moody frame of mind. Tuesday morning all was clear, the barometer indicated fair weather, and we started early, reaching the 8500-foot ridge at 1 P. M. Turning our horses loose to feed upon the succulent grass, we bound our blankets upon our backs and started for Ewing's camp, altitude 11,000 feet. Evening coming on, we made camp at 10,500. Clearing away the rocks, leaving a sandy bottom, we stretched our light, small tent, banking wet sand around the edges to keep out the piercing wind, which almost invariably blows at high altitudes. Placing our oilcloth over the damp, cool sand, we soon had a comfortable bed. For tent poles we used our alpine stocks, one of which was seven and one-half feet long. Our bed being satisfactorily arranged, we took notes on the scenery, temperature, etc. A haze hung over the valleys; in fact, it rose to a height of nine thousand

feet. The rosy-tinted summits of Hood, Adams and St. Helens towered away above it, however, reflecting the rays of the declining sun.

The chilliness of the temperature, 28 degrees, prevented us from remaining long outside our tent. Crawling in, we tightly fastened the flaps and really passed a comfortable night. Twenty minutes after 4 A. M. found us astir, and at five o'clock we were under way.

We had scarcely as yet taken time to admire the beauties of the scene, so intent had we been on getting an early start so as to be able to return before sundown to our blankets and provisions.

We soon had an opportunity to admire the beauties around and below us, as climbing above eleven thousand feet altitude is productive of sudden stops for rest and breath.

We expected to reach the summit by noon, at latest; but on account of the icy condition of portions of the mountain side, it was necessary to cut steps over quite long stretches. This delayed us more than two hours. Twelve o'clock came and went and we were not quite to the top of the "big rock"—a large rock on the south side, the top of which is about two thousand feet below the summit.

By 1 o'clock we were past the rock several hundred yards. From here to the summit we crossed eight or nine crevasses. The snow or ice stood in pinnacles often six and seven feet high.

Three o'clock came and the top was still beyond us. Having no blankets or provisions, the question now presented itself: Could we make the summit and back over the dangerous points before dark. Not much talking was done, however, as breath was too precious; but we still pushed on.

At 4 o'clock we held a council of war and decided that since it was already so late we could not return before dark, and we would make for the summit, where steam caverns were said to exist, and where Messrs. Longmire and Van Trump stayed over night in '83. They found themselves in the same predicament we were now in, by their determination to reach the summit. This being settled, we pushed on, turned out of our way by first one and then another obstacle, until we found ourselves about one hundred feet, not more, below the summit of the highest western bump or dome. From this we decended about a hundred feet, and thence across a level piece of snow about one-third of a mile, to the foot of the main pinnacle, in which is located the crater.

Some three hundred feet (in altitude) more climbing, over ashes and fine pumice stone of the outside walls of the crater, and we stood on the apex of one of the highes. mountains in the United States. Mr. Nichols claims the honor of being the first and only Tacomaite who has reached the summit.

It was now 5:10 p. m., the thermometer registering 23° above zero; and having no blankets, our first

1. *Snowballing on Mt. St. Helens, July 22d, 1889*
2. *Summit of Mt. Hood, looking West.*
3. *Illumination Rock on Mt. Hood.*

business was to find a warm place in the steam to pass the night. Steam could be seen issuing from a dozen different places on the inside rim of the crater, say sixty to seventy feet below the crest.

Writing our names on a card, with a short account of the climb, we placed it inside of a small box, on which was inscribed, "Oregon Alpine Club, Portland." This was left on the top of the ridge. We heaped rocks around it to prevent the wind from blowing it away. We soon found a sort of semi-spherical opening in the rocks, from which the warm steam poured forth. Clearing away the rocks, leaving a sandy bottom, we built a wall of rocks two feet in height to break the wind, and then turned our attention to looking for canned corned beef.

We were told a can had been left there by Prof. Ingram's party ten days before. This was soon found, together with a package of French chocolate, a box of sardines and some cheese. We were already the possessors of one lemon. As nothing more was needed we got into our den. Taking a cup found lashed to a rock on the crest of the crater and filling it with snow we placed it in our oven and soon had plenty of water.

We ate some lunch, but fourteen and fifteen thousand foot altitudes are not productive of strong appetites, so we ate sparingly, and being so completely exhausted soon fell asleep.

About 8 o'clock p. m., we were rudely awakened by what appeared to be a dash of ice water in our faces

and down our necks. The sky being clear the ice water was explained a few moments later. The wind had arisen and was drifting dry snow—(eight inches of which had fallen Sunday)—from a bank about fifteen feet distant, against the sloping roof and walls of our warm den; thus the snow was turned to water by the time it reached our faces. To prevent being so rudely drenched again we removed our coats, which were then wrapped around our heads.

The wind having veered to the west, some anxiety was felt that a storm might arise before we could return. However, fortune smiled upon us in our dizzy resting place so far above the clouds, and morning dawned clear, cold and beautiful.

Upon the first gleams of the sun we made for the ridge for our dry clothes, which were placed there before retiring to our den the night before. We had fortunately worn two suits of heavy underclothes, two pairs of pants and two coats, so we now had dry clothes, and well it was we took the precaution of removing a suit and placing it out of the way of the wet steam. Before we could return to our den every vestige of clothing, including a soft hat, was frozen stiff. The cold seemed to strike at once clear through. The agility with which we got into our steam chest would have been amusing to an uninitiated observer. We were soon warm again, and by slight assistance from each other, our dripping clothes were soon changed for dry ones. Mounting the ridge of the crater on the highest side, sunrise observations were taken.

The sun appearing above the eastern horizon tinted Rainier's top with molten silver, while the country beneath was still wrapped in shade Not many moments elapsed till the adjacent mountains, Hood, Adams and St. Helens, one by one in order named, donned their silvery shields like mighty giants in battle attitude, defending themselves against the sun, their common enemy. The effect at this time was grand, indeed, the heavy rains of two days previous having entirely dissipated the smoke.

Eastward all was clear, while westward, nearly fifteen thousand feet below, the valleys and lowlands were hidden beneath billowy clouds, which, like the mountain tops, soon turned from gray to shining silver.

Soon Sol's rays had reached the western horizon. Mountain shadows now appeared reaching westward to the limit of our vision ; the jagged edges resting on hills and plains and valleys contributed to a changing scene, the memory of which will last so long as life is given.

Our selfish aim more than attained, we were satisfied and determined at once to descend to earth, from whence we came. Our determination being carried out, we reached Hot Springs at 8 p. m., and Tacoma three days later.

CHAS. H. GOVE,

Of Oregon Alpine Club.

What they Signify.

Adams, Mt.—Called by Winthrop, Tacoma the Second (1853). Named for President Adams.

Indian name Pat-to, signifying high. This name was applied to snow caps generally by the Indians.

Baker, Mt.—Named for Lieut. Baker by Vancouver, when discovered April 30, 1792.

Called by Winthrop (1853), Kulshan; possibly the Indian name.

Referred to by the Spanish as Montana del Carmelo.

Called Mt. Polk by the Americans (1846).

Bitter Root Range.—Same as the Cœur d'Alene mountains.

Coffin, Mt.—Originally used as an Indian burying ground and named by Lieut. Broughton (1792).

Castle Rock.—Referred to by Lewis and Clark as Beacon Rock (1805). Subsequently called Castle Rock, because of its appearance.

Cascades.—Known as President's Range (1846). The mountains were named for the cascades of the Columbia river.

Cape Horn.—So named because of the difficulty experienced in doubling it (1812.)

Goat Mountain.—Called Plas (long sound of a) by the Indians, meaning white. So called because of the white rocks. Mountain goats formerly abounded in that vicinity, hence the present name.

Hood, Mt.—Discovered by Broughton, October 29, 1792, and named for Lord Hood of England. General Indian name, Pat-to. An active volcano in 1846. Same as Mt. Washington of the Americans (1846).

Jefferson, Mt.—Discovered by Lewis and Clark and named for President Jefferson, 1806. Same as Mt. Vancouver of the British (1846).

McLaughlin, Mt.—Lat. 43° 30′. Named for John McLaughlin who established Vancouver, introduced live stock, fruit, vegetables and grain. Same as Mt. Madison of the Americans (1846). Sometimes called Diamond Peak.

Oregon.—First used by Capt. Jonathan Carver in a book published in London (1774). The name appeared in the following statement: "The river Bourbon empties itself into Hudson's Bay; the waters of St. Lawrence; the Mississippi and the river Oregon, or the River of the West, that falls into the Pacific ocean at the straits of Anian." Numerous theories are advanced as to the origin of the name with Carver, but nothing conclusive is shown on the subject. The original Oregon embraced an uncertain portion of the entire Northwest (1578), called by the British New Albion. One portion of it was called New Georgia (1792), and another (1806), New Caledonia by British traders.

The Spanish government designated the entire country (1790), as "The Coast of California, in the South Sea."

Olympus, Mt.—Was discovered by Juan Perez, a Spanish pilot, and called El Cero de la Santa Rosalia. Named Olympus by Capt. Mears, July 4, 1788. Same as Mt. Van Buren (1846).

Puget Sound.—Named by Vancouver for his lieutenant, Peter Puget, the discoverer, May 19th, 1792. Known among the Indians as Whulge, also as K' uk' hults.

Rainier, Mt.—Discovered by Vancouver in May, 1792, and named for Rear Admiral Rainier of the English navy. Sometimes called Mt. Tacoma. Called Mt. Harrison by the Americans (1846). See pages 55, 57 and 59.

Rocky Mountains.—Named by the Verendrye brothers (1742). First called Stony Mountains.

Saddle Mt.—Called by the Indians, "Swallalahoost." Named by Wilkes, Saddle Mountain (1842), on account of its shape.

St. Helens, Mt.—Discovered by Broughton of Vancouver's party, October 20, 1792, and named in honor of His Majesty's ambassador at Madrid. Known among Americans as Mt. Washington (1846), as also Mt. John Adams. Called by the Indians Lou-wala-clough, meaning, smoking mountain.

Tillamook Head.—(1806), originally spelled Killamook. Lewis and Clark refer to it as "Clark's Point of View.

Tacoma, Mt.—See Rainier, also pages 55, 57 and 59.

Mount Rainier.

U. S. INDIAN SERVICE.

Nisqually and Skokomish Agency,
Tacoma, W. T., Dec. 8, 1886.

W. G. Steel, *Portland, Oregon:*

Dear Sir:—I have the honor to acknowledge the receipt of your letter of Sept. 21st, making certain inquiries about the change of the name of Mt. Rainier to that of Tacoma. Upon careful and diligent inquiry among the Puyallup Indians, I find the following to be the true condition of things:

There is a general impression that the name Tacoma was the original name of the mountain among Indians, and that it signified "nourishing mother," and was so named on account of its being the source of a number of rivers which head there and flow into the waters of Puget Sound. This, I find to be entirely erroneous. The Indian word is *Ta-ko bet* or *Ta-ko-man*, the first being the most general pronunciation used among these Indians, but both words are used, being the different pronunciation used by the dialects. It means a white mountain, and is a general name for any high, snow-covered, or white, treeless peak. It is applied to this mountain by the Indians of this vicinity, because it is the only, or most prominent one of the kind in the vicinity. They use

the word as we would speak of "The White Mountain," there being but one near us. In the Skadgit language, the word is a little different, and is there called *Ko-ma*, and is applied by these Indians to Mt. Baker, it being the mountain in that vicinity of the kind. The word *Squa-tach*, or *Squat-letsh*, is a general name for a range of mountains, while *Ta-ko-bet* or *Ta-ko man* or *Ko-ma* is the name of the snow covered or white peaks in the range.

This information I have gained from inquiry of the Indians with whom I have come in contact and who live near here. I inclose a statement written out by Rev. Peter Stanup, an educated Indian of the Puyallup tribe, and who is unusually well informed on such matters.

As to when it was first applied and by whom I am not so well advised; but from what I do know, I understand that it was first applied to the mountains by the whites about twelve years ago, and at the same time that the town of Tacoma was laid out and located by the Northern Pacific Railroad Company, or some of its attaches. I understand that the attempt was made by the N. P. R. R. Co. to have the name changed, and that it still makes strenuous efforts to do so. The people of the town of Tacoma, and the members of the Tacoma Land Company as well as the R. R. Co., above named, all try hard to have the mountain called by that name; while the residents of the other part of the Territory, west of the Cascade mountains

and especially of Seattle, are very much opposed to the change, and continue to call it by its first name. I think that the facts are that the name *Tacoma* is an attempted imitation of an Indian term applied to any high, snow-covered peak, but which was supposed to be the special name of this peak, because generally used by the Indians of this vicinity, and that it was applied to this mountain at the time the town of Tacoma was located and named by the N. P. R. R. Co., for the purpose of bringing into note its western terminus.

Yours Respectfully,

EDWIN EELLS,
U. S. Indian Agent.

Statement of Rev. Peter Stanup.

Ta-ko-man is a name used by many different Indian tribes of this Territory, with the same meaning and a slight variation of pronunciation by each different tribe. It is the name or word from which Tacoma was derived. It originated among the inland Indians. The meaning of *Ta-ko-man* is a high, treeless, white or light colored peak or mound. The name is applicable to any peak or mound as described, but is generally used for one that is distinguished, or highly honored. And *Squa-tach*, to climb, and *Sba-date* mountain, are mostly used for all mountains and peaks. The individual name of Mt. Tacoma is *Twhauk*, which was derived from *Twheque*, snow, and

Swheque ad. Bright, clear, cloudless sky. *Ta-ko-man* is mostly used for the Mt. Tacoma, as it is held with much respect and esteemed by nearly all the Indians of the Northwest. The reason for conferring the great honor upon *Twhauk*, is that the second syllable *ko*, means water, corresponding with the water, or little lake on top of the mountain, and also in that lake is a great abundance of valuable shells, from which the Indians made their nose and ear-rings, and other valuable jewelry.

Thoughts on the Name "Tacoma."

THIS beautiful name of the city whose rapid and marvellous growth and development have been unparalleled even in our Western civilization, is a pure invention. Its very euphony divests it of all claim as the Indian nomination of Old Mount Rainier, the name conferred by the illustrious circumnavigator, George Vancouver, borne for a century upon the map of the world.

Tacoma is a word of extremely modern origin, invented, or used first by Lieut. Theodore Winthrop, U. S. Army, in his readable book—"Canoe and Saddle." The writer of these thoughts first heard it late in the "sixties," when Capt. D. B. Finch, among the pioneers of steam navigation on Puget Sound, presented a building in Olympia to the Good Templars, and his gift was christened "Tacoma Hall." Cotemporaneously Tacoma City, now the first ward of Tacoma, was thus named by some Portland town-builders—Gen. McCarver, Lewis M. Starr and James Steel. The then leading hotel of Olympia, about the same time, assumed that title and wore it for several years; but a whole decade passed before the attempt was made to obliterate the time-honored name of the great mountain peak of Northwest America, conferred at the first visit of white men to Commencement Bay in

1792. Late in 1878, a lithograph map and bird's-eye view of the embryo city of New Tacoma was published under the patronage of the Tacoma Land Company, entitled—"New Tacoma and Mount Rainier"—issued in 1880. At that date the name "Tacoma" existed, but it was not applied to the mountain; nor was it even dreamed that the town was named from the Indian name of the mountain. The fact is that the name, "Mount Tacoma," has been recently conferred on the mountain by white men. A decade back, the name will not be found on the maps of Washington Territory, and it is to be hoped that the attempt to obliterate from the map of the world the name conferred by that Illustrious contributor to geographic science, Captain George Vancouver, R. N., will prove unsuccessful.

When Gen. Hazard Stevens, and that splendid scholar and writer, P. B. Van Trump, Esq., ascended the grand old mountain, the pronunciation and spelling of the name which Gen. Stevens, in his narrative, ascribed to the mountain, was still unsettled. He spelt the word Te-ho-ma. The "h" being aspirated really represents an Indian guttural grunt without beauty or even resolving itself into a well-defined consonant.

In the year 1882, the writer was invited to perform the role of orator on Independence Day at the beautiful settlement called Puyallup. The committee coupled with the invitation the expressed desire that the theme should be Puget Sound reminis-

cences—the early settlement of Pierce county. He adopted as a starting theme the thoughts suggested by the words "Tacoma" and "Puyallup," or their origin thus euphonized into household words of significance and anglicised beauty, bearing but little resemblance in sound to the half-uttered nasal grunts of the fish-eating natives of Puget Sound, whose syllables are "without form and void;" their language, if such it be considered, acquiring meaning or intensity of signification when accompanied by pantomimic motion, speaking far more than all their syllabic combinations. Through the valued assistance of that veteran Indian student and interlocutor, John Flett, some twenty aged, prominent Indians, who would not deign to talk other than their own dialect, who despised even the Chinook Jargon, but adhered to the grunts and syllabic utterances and the pantomime of their race for the ages before the advent of the Hudson's Bay Company or American settlers, gathered in the writer's office in New Tacoma, as the city of Tacoma was then called, and seated on the floor for hours discussed what they called the mountains and mountain range, its surrounding and attributes. About half were of the White river bands, those who originally lived on the sources of the streams issuing from Mount Rainier. The remainder were Puyallups and 'Squallys, whose original haunts were near the Sound. The form was to put the writer's question or wish for information into Chinook Jargon, which was then translated into the Indian

dialect. The old men expressed themselves in their native utterances. It would be the grossest perversion to call their answers "words." They were not so couched—at best, strong syllabic utterances—mere grunts, at times which, with eloquent pantomime, assumed grand and eloquent thought and meaning, when translated, to give just expression arising to poetry of ideas, but as a language, technically so considered, poverty-stricken to the greatest degree, and without its accompanied earnestness of movement, without a single attribute of beauty or euphonism.

That interesting study and those comparative views, by old men of the mountain and the sea, extended through hours; and the writer will never forget the eloquence of action required and used by those aged natives, which more than compensated that paucity of syllables or words, which we call language. No such word of beauty as "Tacoma" could possibly be coined by them, nor result from any combination of their uttered but significant grunts, their attempted vocalization of thoughts or ideas. True, there were syllabic emissions of sound which might be resolved into words by toning down grunts and inharmonious belchings of thoughts rather than their legitimate utterances. The manner of conducting that 'interview" was the assumption that the word "Tacoma," or some kindred appropriate word identified the grand old mountain in their language; in other words, their attention was invited to the fact, that our people had been told that "Tacoma" was the native name of

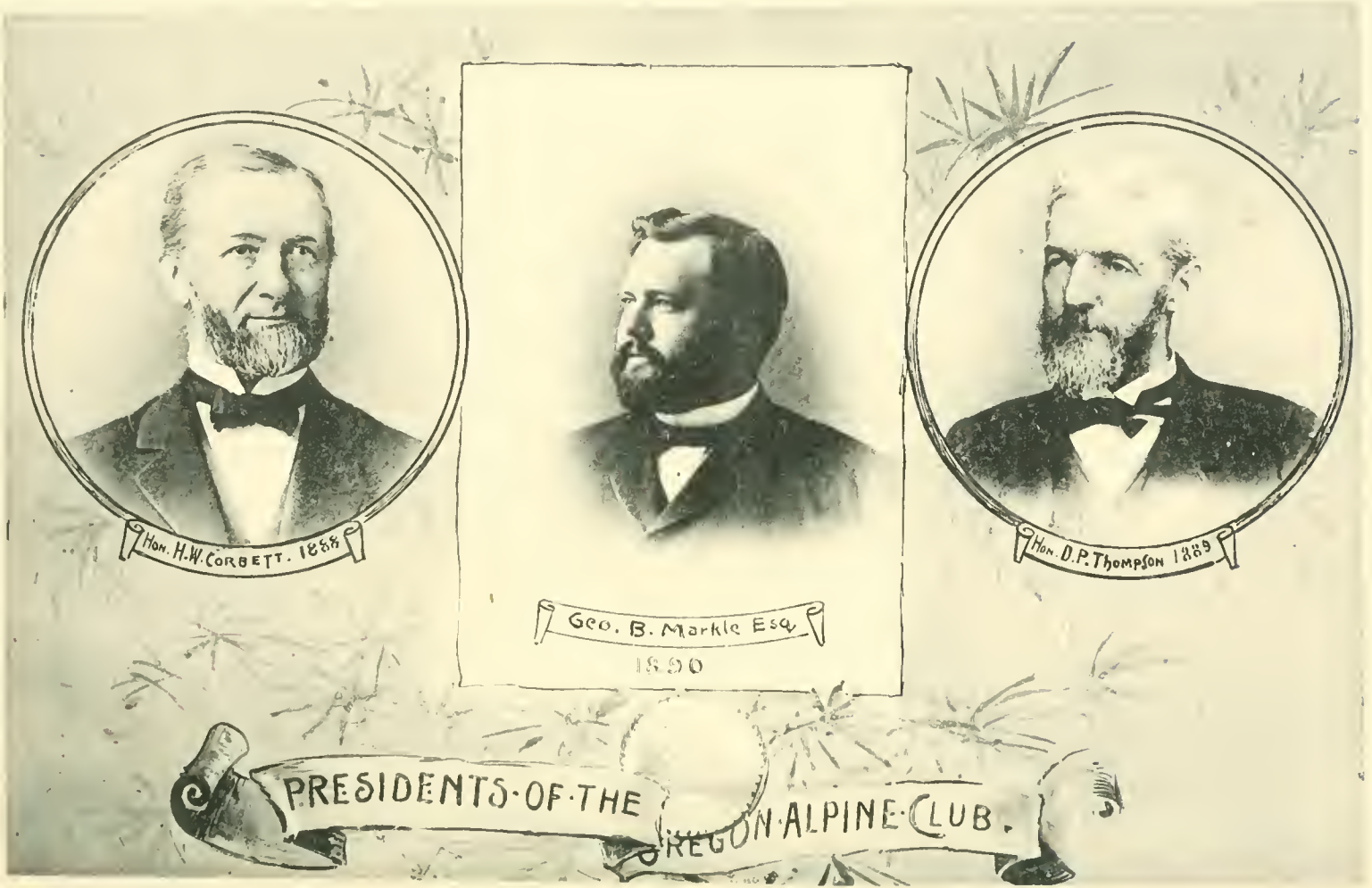
the mountain. Then began the expression by all, in turn, as to the Indian method of referring to great landmarks, mountains individual and in range, rivers, etc., when talking with each other. Their views on the information communicated found expression in several varied, combined characteristic grunts and shrugs, which were interspersed with some analogous syllables or utterances from which Indian philologists have resolved words, some of which have more or less resemblance to some of the syllables embraced in the word Tacoma, or that word as spelled by different writers. They then detailed their reasons for so speaking of the mountain or any of its natural surroundings or physical features. In that colloquy, no two of those Indians pronounced the same word or used that same guttural utterance or combination of syllables. All were especially interrogated as to the snow-capped mountain. All gave the meaning or idea that they knew as to the cause for a name, by which any other could identify it, and the significance of the utterances by each adopted in referring to it.

Each band, not to say each individual, had a peculiar reason for his name of it, contingent upon color, shape or function. In that interview, the literal translations of their syllabic combinations appertaining more or less in sound to the syllables constituting the name Tacoma—Te-ho-ma, Ta-ko-ber, Tak-o-man, etc., as rendered by the venerable John Flett, a truthful, skillful and reliable Indian authority was—"A

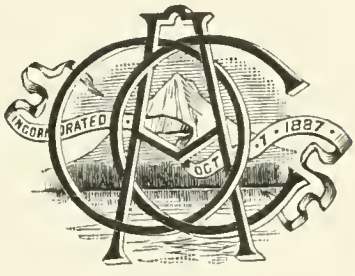
woman's breast that feeds," a "nourishing breast." To one band, the shape of the cone suggested the breast shape for a name; to another, the milky whiteness was a reminder of the source of nourishment; to another, the color of the streams which flow down from the mountain in the annual freshets, gave origin to the idea of the generous fountain of the great milk-white breast-shaped sentinel for ages; while the Puyallups and 'Squallys, more practical in view, associated the fact that from the mountain rushed the torrents of white water, resembling milk, which fertilized the valleys of Puget Sound. While such was the conversation and speech of those old patriarchs, several of whom had lived to become octogenarians, communicated as above stated, the writer is well aware that across the mountain chain, residing in the vicinity of the mountain, that several bands of the Klikitat nation attach different meanings for synonymous syllabic combinations approximating in sound to the combinations referred to used by Western Washington bands, with shades of meaning more practical, less figurative, less Indian; but the writer has been content to accept as authority, at all events so far as the Aborigines of Western Washington are concerned, the result of the conference of Indian patriarchs convened at his instance in 1882. While that conference failed to establish that there was such an Indian word as "Tacoma," or that these Indians had any distinctive Indian names for "Mount Rainier," or that there was any recognized Indian name known to the sev-

eral tribes; yet, the different bands did use such syllabic utterances, by which they referred to the mountain chain, to the leading mountain of the chain. That color, shape, and attributed function, suggested such expression, and that the combination of syllables which have been so euphoniously metamorphosed into the beautiful word "Tacoma," when pronounced by them in its native utterances, meant as herein expressed. The writer, however, finds no warrant for adopting Tacoma as an Indian word, nor does he believe that such word, or its approximate, was a name conferred by Indians upon the mountain, or exclusively recognized as the name of the mountain by the original natives of this region.

ELWOOD EVANS.


Hon. H.W. Corbett. 1888
Geo. B. Markle Esq
1890
Hon. D.P. Thompson 1889
PRESIDENTS OF THE OREGON ALPINE CLUB.

Oregon Alpine Club.



The Oregon Alpine Club was organized in 1887, and incorporated October 7th of that year. It was originally intended merely as an organization among half a dozen friends who were in the habit of seeking adventure and recreation in the mountains.

After considering the matter for a time a meeting was called, and more persons attended than were expected. A committee was appointed on rules, the adoption of which required several meetings, so that when the organization was completed there were over seventy charter members on the roll.

The institution grew and its objects increased until a Scientific Staff was formed and a public museum became an important object. Hon. H. W. Corbett was elected President, and served until October, 1888, when Hon. D. P. Thompson was chosen. Mr. Thompson served until the close of 1889, when a re-organization

was effected, as outlined by the subjoined constitutions. Mr. Geo. B. Markle was at this time elected, and is now the very efficient President of the Club. The Alpine Club is a public institution and is deserving of the liberal support of the city and State. The following is a list of officials, as also the Constitutions of the Club and its various Departments:

Constitution.

OFFICERS.

President, - - -	Geo. B. Markle
Vice Presidents, -	W. G. Steel
	W. W. Bretherton
	John Gill
Secretary, - - - -	Geo. H. Himes
Treasurer, - - -	C. M. Idleman

ARTICLE I.

NAME.

This Association shall be known as the Oregon Alpine Club, and its subdivisions as the Departments of the same.

ARTICLE II.

OBJECT.

The object shall be the foundation and maintenance of a Public Museum, and advancement and encouragement of Amateur Photography, Alpine and Aquatic exploration, and the protection of our game, fish, birds and animals.

ARTICLE III.

SECTIONS.

There shall be Four Departments, namely, (1) Ex-

ploration Department; (2) Photographic Department; (3) Game Protective Department; and (4) Museum Department.

ARTICLE IV.

OFFICERS.

SECTION 1. The officers of the Club shall be a President, four Vice Presidents, Secretary and Treasurer.

SEC. 2. The Presidents of the various Departments shall be *ex-officio* Vice-Presidents of the Club.

ARTICLE V.

ELECTIONS.

SECTION 1. The officers shall be elected by ballot on the second Friday of December in each year, a majority of all votes cast being necessary for election; and shall hold their respective offices until their successors are elected and qualified.

SEC. 2. Each Department shall elect its own officers.

ARTICLE VI.

The duties of President, Vice-Presidents, Secretary and Treasurer shall be those usual to such officers.

ARTICLE VII.

DIRECTORS.

SECTION 1. The President, Vice-Presidents and four members shall constitute the Board of Directors, who will be the managing power of the Club.

SEC. 2. They shall employ a Curator and provide for his compensation.

ARTICLE VIII.

CURATOR.

The Curator shall be a taxidermist, and shall have full charge of the Museum and other property of the Club, under the direction of the Board of Directors.

ARTICLE IX.

MEMBERSHIP.

SECTION 1. There shall be three classes of members, namely, Active, Associate and Honorary.

SEC. 2. An active member is one who has signed the Constitution, paid his dues, and been admitted to any of the Departments.

SEC. 3. An Associate member is one who has not been admitted to any of the Departments.

SEC. 4. Any person may become an Associate member by signing the Constitution and paying his dues.

SEC. 5. Honorary members shall be entitled to all the privileges of the Club except voting. Their names shall be proposed at one meeting and voted on at the next, three-fourths of all votes cast being necessary for election.

SEC. 6. Any member may be expelled by a two thirds vote of the members present: *Provided*, That one week's notice has been given at a regular meeting

ARTICLE X.

DUES.

SECTION 1. An initiation fee of two dollars shall be charged all persons joining the Club.

SEC. 2. The dues shall be six dollars a year, payable quarterly, in advance.

SEC. 3. Any member who shall fail to pay his dues for six consecutive months, shall have his name stricken from the roll, and be considered no longer a member: *Provided, always*, One month's notice has been given him in writing by the Curator.

ARTICLE XI.

All questions in dispute between the Departments shall be referred to the Directors for final settlement.

ARTICLE XII.

The Oregon Camera Club is hereby incorporated as the Photographic Department of the Oregon Alpine Club. All members of the Oregon Camera Club in good standing, becoming members of the Photographic Department of the Oregon Alpine Club, on ratification and acceptance of this article by the Camera Club.

ARTICLE XIII.

AMENDMENTS.

The Constitution may be amended by a two-thirds vote of members present: *Provided*, That one month's notice has been given in writing, at a regular meeting, and has also been posted in the Club rooms for one month.

EXPLORATION DEPARTMENT.

OFFICERS.

President, - - - -	W. G. Steel
Vice President, - - -	Edward Casey
Secretary, - - - -	M. W. Gorman
Treasurer, - -	Dr. Willis I. Cottel

CONSTITUTION.

ARTICLE I

NAME.

This body shall be called the Exploration Department of the Oregon Alpine Club.

ARTICLE II.

OBJECT.

To encourage the exploration of mountains, lakes and rivers, by either scientists or pleasure seekers, to foster pleasure outings by land or water, to award appropriate prizes for meritorious outfits for journeys and cruises, and for speedy trips on land, and swift cruises by water; and to conserve the handling of gun and sail as an accomplishment, and incidentally to encourage canoeing as a means to reach wide fields for research and pleasure, awarding prizes for the handling of the same.

ARTICLE III.

OFFICERS.

The officers shall be a President, Vice President, Secretary and Treasurer, whose duties shall be those usual to such offices.

ARTICLE IV.

MEMBERSHIP.

SECTION 1. No one shall be competent for membership, except members of the Oregon Alpine Club.

SEC. 2. It is understood that when the membership of any person ceases in the Oregon Alpine Club, such person shall cease to be a member of this Department.

SEC. 3. All propositions for membership shall be in writing.

SEC. 4. Every name submitted for membership, shall be proposed at one meeting, and voted on by ballot at the next, two-thirds of all members present being necessary for election.

SEC. 5. Any member may be expelled for conduct unbecoming a gentleman, by a two-thirds vote of the members present: *Provided*, That one month's notice has been given at a regular meeting.

ARTICLE V.

DUES.

SECTION 1. An initiation fee of one dollar shall be charged all members, and the monthly dues shall be twenty-five cents each, payable quarterly in advance.

SEC. 2. Any member who shall fail to pay his regular dues for six consecutive months, shall have his name stricken from the roll, due notice having been given him by the Secretary.

ARTICLE VI.

MEETINGS.

SECTION 1. Regular meetings shall be held on the second Monday evening of each month, at such hour as shall be agreed upon from time to time.

SEC. 2. Special meetings may be called by the President, or by a call signed by five members: *Provided*, That such a call shall state the object of the meeting.

SEC. 3. An annual meeting shall be held on the second Monday in December of each year, for the election of officers, and such other business not provided for herein.

ARTICLE VII.

TRUSTEES.

A Board of five Trustees shall be chosen at the annual meeting each year, who shall have the general management of all the affairs of the Department.

ARTICLE VIII.

QUORUM.

Five members shall constitute a quorum competent to transact business.

ARTICLE IX.

AMENDMENTS.

This Constitution may be amended by a two-thirds

vote of members present: *Provided*, That one month's notice has been given in writing at a regular meeting, and a copy of said notice posted in the Club room for one month.

Game Protective Department.

[Not Organized.]

PHOTOGRAPHIC DEPARTMENT.

OFFICERS.

President, - - -	W. W. Bretherton
Vice President, - - -	H. Goldsmith
Secretary and Treasurer, -	E. E. Norton

CONSTITUTION.

ARTICLE I.

NAME.

This association shall be known as the Photographic Department of the Oregon Alpine Club.

ARTICLE II.

OBJECT.

Its object shall be to encourage and promote practical Photography, and to invite and stimulate discussion and investigation of all that pertains to Photographic science and art.

ARTICLE III.

MEMBERSHIP.

The Department shall be composed of such members of the Oregon Alpine Club who practice Photography as amateurs, as shall be elected there and shall be known as active members, and such

Honorary and Associate members as shall be elected by the Department from the members of the Oregon Alpine Club.

Candidates for election may be proposed for election at one meeting, and voted on at the same meeting. All applications for membership shall be voted on by ballot, and it shall require two-thirds of all votes cast to elect any member.

All professional Photographers who are members of the Oregon Alpine Club shall be eligible as Associate members, and shall enjoy all the privileges of the Department except the right of vote or hold office.

ARTICLE IV.

OFFICERS.

The officers of the Department shall be a President, Vice-President, one or more, a Secretary, and a Treasurer; the offices of Secretary and Treasurer being held by one member if so desired by the Department.

ARTICLE V.

QUORUM.

The attendance of two officers and three or more members shall be necessary to constitute a quorum for the transaction of business, but the constitution or by-laws shall not be changed except at a meeting called for that purpose by the Secretary and by a vote of two-thirds of all votes cast.

ARTICLE VI.

ANNUAL MEETING.

The Annual Meeting of the Department shall be

held on the third Friday of January in each year, for the election of officers and such other business as may come before the meeting.

ARTICLE VII.

MONTHLY MEETINGS.

The monthly meeting of the Department shall be held on the third Friday of each month.

ARTICLE VIII.

DUES.

The dues of the Department shall be $3.00 per year, payable to the treasurer of the Department.

Presidents of The Oregon Alpine Club.

Henry Winslow Corbett, the first president of the Oregon Alpine Club was elected immediately after its organization and served until the close of 1888. He was born at Westborough, Mass., February 18th, 1827, and came to Oregon, via Cape Horn, with a stock of general merchandise, arriving at Portland, March 4th, 1851. In 1866, he was elected U. S. Senator and served six years with credit to himself and honor to his State. He is one of the wealthiest and most influential men in Oregon. The following in reference to him is taken from the History of Portland:

"In person, Mr. Corbett is six feet high, straight and spare in figure, but symmetrically formed. Cautious, cool-headed and decided, he is not an inviting mark for the wiles of the schemer or impostor, but he is thoroughly approachable, respectful and considerate toward those whom he meets, and utterly lacking either in the arrogance of small greatness, or in the still more objectionable truckling and assumed *bonhommie* of the small politician. He is thoroughly dignified, and yet his manners are so unassumingly easy that one hardly notices them. Indeed he is a fine type of that well approved manhood in which courtesy, kindness, dignity, culture, honor and charity are most happily blended. To these excellences can be

added unswerving integrity, honesty of purpose, purity of thought and act, and those crowning virtues born of an ever present and controlling moral sentiment. His career shows what can be accomplished by steady and quiet energy, directed by sound judgment and high purpose. His name has been associated with numberless successful enterprises, but not one failure, and he is justly entitled to a foremost place among those who have created, established and maintained the commercial and industrial supremacy of Portland."

"David P. Thompson, one of the most widely known men in our State, was born in Harrison county, Ohio, in 1834. In his nineteenth year he came to Oregon, driving sheep across the plains and walking every rod of the way. Upon his arrival at Oregon City in 1853 he took a job of cutting cordwood, which lasted through the winter. Soon after he entered upon the profession of a surveyor, which he followed during several years. In pursuance of this business he acquired an unequaled knowledge of the northwestern country, and laid the foundation of his present ample fortune. He lived at Oregon City till 1876, when he removed to Portland. In 1879, and again in 1881, he was elected mayor, and gave the city a vigorous and efficient administration. Mr. Thompson, throughout his whole life, has been noted for activity and energy. He is a man of firm and positive character, tenacious of his purposes, active in business and successful in his undertakings. By appointment of President Grant he became governor of Idaho Territory in 1875, but resigned the office in 1876. He is now engaged in the banking business in Portland."—(History of Portland,—Scott.) Mr. Thompson served as president of the Alpine Club in 1889.

Mr. George B. Markle is at the present time serving as president of the Alpine Club. He was born in Hazleton, Lucerne county, Pennsylvania, October 7th, 1857, and came to Oregon in 1886. His desire to locate in the west led him to make a tour of inspection, which embraced Kansas, Nebraska, Colorado, Utah, California, Oregon and Washington. A careful examination of all this region convinced him that Portland offered the best inducements as a business point, combined with all the advantages of an old settled community, and in the fall of 1886 he permanently located in this city. He immediately became a factor in the busy life around him, and displayed a business generalship which marked him as a man of unusual power, and gave him a place among the foremost business men of the city seldom accorded in any community to one of his years. With others he organized the Oregon National Bank, of which he is vice president; also the Ellensburgh National Bank, the Northwest Loan and Trust Company and the Commercial Bank of Vancouver, being president of the last three corporations named. He was one of the purchasers of the Multnomah Street Railway; reorganized the company and ever since has been its president. He is also president of the Portland Mining Company, owning the Sunset group of mines in the famous Cœur d'Alene district. He was one of the leading spirits in organizing the great enterprise of the North Pacific Industrial Association; purchased the land upon which to erect the necessary buildings and secured a large number of subscriptions to its capital stock. He was one of the leading spirits in the organization of the Portland Hotel Company and is prominently identified with many other enterprises.—(History of Portland, —Scott.)

Oregon Bibliography.

1853—Adams, Mt.—Called by Winthrop, "Tacoma the Second,"—(Canoe and Saddle, page 48).

1889—Called by the Indians "Pat-to," which signifies standing up high. With the Indians this was a general term for snow capped mountains.

Located in latitude 46° 12′ 14.1″, longitude 121° 31′ 08.3″.

1775—Adams Point—Discovered by Heceta and called Cape Frondoso (Leafy Cape).

1792—Capt. Gray subsequently entered the river and named it Point Adams.—(Life on Puget Sound,—Leighton, page 48. Pacific States, vol. 22, page 163).

1792—Admiralty Inlet.—Named by Vancouver for the Board of Admiralty.—(Life on Puget Sound, p. 155).

1766-9—Alaska.—Named by Russians.—(Willamette Valley, page 62). The name is derived from a Russian corruption of an Aleutian word, "Alakshak," which signifies Continent, or a large country. The Russian version of the term was "Aliaska," and it applied only to the prominent peninsula jutting out from the continent. Made a general term by the United States.—(Supplement to Encyclopedia Britannica, vol. 1, page 157).

1507—America.—First applied to the new world in a work entitled "Cosmographiæ Instructio, etc., in super quatuor Americi Vespucii Navigationes," written by Marti

Waldseemuller, under the assumed name of Hylacomylus and printed at Saint Die, in Lorraine.—(History of Oregon and California,—Greenhow, page 48).

1808—American Fur Company organized.—(Burrows' Oregon, page 58).

1846—Applegate, or Southern Route—Constructed by Jesse Applegate.—(Pacific States, vol 22, page 642).

1811—Astoria founded by John Jacob Astor, April 12.—(Encyclopedia Britannica, vol. 2, page 737. History of the Willamette Valley, page 153).

1813—Captured by the English and name changed to St. George.—(Burrows' Oregon, page 63).

1818—Repossessed by the United States.—(Burrows' Oregon, page 65).

1865 — Atmospheric River of Heat. — General course, effects, etc.—(Miners and Travelers' Guide,—Muller, page 61).

1792—Baker's Bay.—Named by Broughton for Capt. Baker, of the brig Jenny.—(Three Years' Residence in W. T., —Swan, page 129).

1792—Baker, Mt.—Named for Lieut. Baker, by Vancouver, April 30.—(Vancouver, vol. 2, page 56).

1853—Called by Winthrop, "Kulshan," presumably because of being the Indian name.—(Canoe and Saddle, page 47).

1846-8—Same as Mt. Polk.—(Oregon and California,—Thornton, vol. 1, page 256).

1868—The summit is described and illustrated in Harper's Monthly for November, page 806, by E. T. Coleman.

1869—Called by the Spanish, "Montana del Carmelo." —(Life on Puget Sound,—Leighton, page 160).

1842-6—Barlow Road.—See Indian Trail.

1851—Battle Rock at Port Orford.—First trip from here to the Willamette Valley (with notes by a participant).—(Oregon and Washington,—Armstrong, page 60).

1792—Bellingham's Bay.—Named by Vancouver.—(Vancouver, vol. 2, page 214).

1728—Behring sent out by Russia on a voyage of discovery.—(Barrows' Oregon, page 22).

1865—Bitter Root Range.—Same as the Cœur d'Alene Mountains.—(Miners and Travelers' Guide,—Mullan, page 63).

1841—Blanchet, Father.—Visited by Wilkes.—(Wilkes' Narrative, vol. 4, page 349).

1775—Bodega, Don Juan de la.—Sailed north to 58° and returning discovered Bodega Bay in 38° 18′.—(History of Oregon,—Twiss, page 57).

Bonneville.—Named for B. L. E. Bonneville, who explored the Rocky Mountains in 1832 and visited the Columbia in 1834.—(Pacific States, vol. 23, page 568).

1792—Broughton, Lieut.—Entered the Columbia River, October 20th, and was surprised to find the brig Jenny, of Bristol, Capt. Baker, lying there at anchor.—(Three Years' Residence in W. T.,—Swan, page 129).

1792—Bulfinch's Harbor.—Discovered by Captain Gray.—(Oregon and Its Institutions,—Hines, page 15) See also, Gray's Harbor.

1543—Cabrillo.—See Viscaino.

1775—Cape Disappointment.—Discovered by Heceta, August 15, and called Cape San Roque. Named Disappointment by Mears, because of his not being able to make the entrance of the river.—(Life on Puget Sound,—Leighton, page 48).

1792—Called Cape Hancock by Gray, but afterwards changed upon hearing that Mears had already named it. —(Three Years' Residence in W. T.,—Swan, page 129).

1778—Cape Flattery.—Named by Captain Cook.—(Three Years' Residence in W. T.,—Swan, page 120).

1792—Cape Hancock.– See Cape Disappointment.

1812—Cape Horn.—So named because of the difficulty experienced in doubling it.—(The Columbia River,—Cox, vol. 1, page 118).

1766—Carver, Capt. Jonathan.—A resident of Connecticut and a soldier of the Canadian war. Left Boston, by way of Detroit, for the waters of the Upper Mississippi, and to cross the continent.—(The Oregon Territory,—Nicolay, page 93).

Cascade Mountains.—Named for the Cascades of the Columbia River.—(American Cyclopedia, vol. 4, page 511. Fremont, page 189).

1846-8 –Same as President's Range.—(Oregon and California,—Thornton, vol 1, page 255).

1805—Castle Rock, called by Lewis and Clarke, Beacon Rock.—(Pacific States, vol. 23, page 47).

1852—Coal discovered near Seahome by Capt. Pattle. —Harpers Magazine for November, 1869, page 795).

1792—Coffin, Mt.—Originally used as an Indian burying ground, and discovered by Lieut. Broughton.—(Vancouver, vol. 3, page 98.—Wilkes Narrative, vol. 4, page 319).

1775—Columbia River—First discovered by Heceta, August15.

Named by him *Ensenada de Asuncion*, or Assumption Inlet. The north point was called Cape San Roque, and the south, Cape Frondoso, (Leafy Cape). In the chart published in Mexico soon after the conclusion of the voyage, the entrance is, however, called *Ensenada de Hceeta*, Hecta Inlet; and *Rio de San Roque*, River of St. Roc.

While in command of the sloop Washington, in August, Capt. Gray discovered, and attempted to enter this opening, but the sloop grounded on the bar and came near being lost; and was also attacked by Indians, who killed one man and wounded the mate.

Gray was shortly afterward transferred to the Columbia, and on another cruise entered the river; sailed up it about twenty miles, and bestowed the name of his vessel upon it.—(Three Years' Residence in W. T., pages 124 to 128.—Pacific States, vol. 22, page 163.—American Cyclopædia, vol. 5, page 513).

Many works published before the discovery refer to a river flowing westward, as "River of the West," "River of Aguilar," "River Thegays."—(History of Oregon and California,—Greenhow, pages 144–5).

1805—Called by the Indians "Spocatilicum"—Friendly Water.—(Life on Puget Sound,—Leighton, page 50). The Indians also referred to it as Wahn-na, or Big River.

1816—The bar was first surveyed by Capt. McClellan, of the Col. Allen.—(Pac. States. vol. 23, page 266).

1846—Was considered accessible for vessels only three months in the year.—(The Oregon Territory,—Nicolay, page 42).

1853—Comcomli.—This Indian Chief is spoken of by Winthrop as one Montgomery.—(Canoe and Saddle, page 77).

1841—Commencement Bay.—Named by Wilkes. (Wilkes' Narrative, vol. 4, page 479).

1778—Cook, Capt.—Sailed along the coast and sighted land at 44°, March 7.—(Oregon,—Moseley, page 8.—History of Oregon and California,—Greenhow, page 150).

1779—Murdered by natives in the Sandwich Islands February 16th.—(History of Oregon and California, page 157).

Corvallis—Of Spanish derivation, and signifies Center of the Valley. Originally, Marysville.—(Oregon and Washington,—Armstrong, page 18).

1598—D'Aguilar, Martin—See Sebastian Viscanio.

1805—Des Chutes River—Called by Lewis, "Towahnahiooks," and by Gass, "The Kimmooenim."—(Pacific States, vol. 23, page 41).

1775—Dissappointment, Cape.—See Cape Disappointment.

1786—Dixon and Postlock were sent out by the King Georges Sound Co. of London and arrived at Cooks River in July.—(History of Oregon,—Twiss, page 61).

1824—Douglas, David—The botanist who gave his name to the Douglas pine (*Abies Douglasii*), and named over one thousand plants, was sent out by the Royal Horticultural Society of London, and remained ten years. —(Pac. States, vol. 23, pages 507-8).

1579—Drake, Sir Francis—Sailed along the coast.—(Oregon,—Moseley, page 8. History of Oregon and California, —Greenhow, page 73).

False Dungeness, see Port Angeles.

1542—Furrelo, Bartoleme—Sailed with two vessels to 41° to 44°.—(History of Oregon,—Twiss, pages 26 and 27. History of Oregon and California,—Greenhow, page 64).

1576—First voyage made from England to seek a Northwest Passage was made by Martin Frobisher.—(History of Oregon and California,—Greenhow, page 77).

1793—First trip to the Pacific, overland, was made by Sir Alex. Mackenzie, who reached the sea at 52° 20′.—(History of Oregon,—Twiss, pages 19 and 20).

1806—First civilized post, or settlement, west of the Rocky Mountains was made by the Northwest Co., on Frazer Lake in 54°.—(History of Oregon,—Twiss, page 21)

1810—First settlement attempted and first house in Oregon built by Capt. Winship forty miles above the sea on the south bank of the Columbia.—(Pac. States, vol. 23, page 133. Oregon,—Moseley, page 9).

1814—First European woman on the Columbia River was Miss Jane Barnes, who arrived at Astoria on the Isaac Todd, April 17th.—(Pac. States, vol. 23, pages 250).

1827.—First fruit tree in Oregon was planted at Vancouver by John McLaughlin, who also introduced live stock, vegetables and grain.—(Pacific States, vol. 23, page 441).

1836—First steamer to visit Oregon was the Beaver, from England.—(Pac. States, vol. 23, page 600).

1598—Florez, Antonio.—See Sebastian Viscanio.

1812—Fraser River—Known among the Indians as Tacoutche-Tesse.

1793—Supposed by Sir Alex. Mackenzie to be the northern source of the Columbia.—(History of Oregon,—Twiss, page 19. Pacific Coast, vol. 22, page 205).

Named for Simon Fraser, who established a post in that region in 1805.—(History of Portland,—Scott, page 16).

1713—France secretly conveys to Spain all her possessions west of the Mississippi River.—(Barrows' Oregon, page 19).

1800—France recovers the western half of Louisiana from Spain.—(Barrows' Oregon, page 20).

1803.—France sells her claims to the United States.—(Barrows' Oregon, pages 21 and 210).

1843—Fremont follows Whitman to Oregon, arriving October 23.—(Barrows' Oregon, page 250).

1786—Fur trade opened by British merchants between Oregon and China.—(History of Oregon,—Twiss, page 18).

Goat, Mountain—Known by the Indians as Plas, (white), because of the white rocks.

1792—Gray, Capt.—Explored the Columbia river twenty-five miles, and named it.—(The Oregon Territory, —Nicolay, page 39).

1792—Gray's Bay—Named by Broughton for Capt. Gray, of the Columbia.—(Vancouver, vol. 3, page 92).

1789—Gray's Harbor—First called Bulfinch Harbor, but changed to Gray's Harbor May 7th.—(Pacific States vol. 22, page 259).

1791—Gulf of Georgia—Called by Don Francisco Elisa, "Canal de Nuestra Senora del Rosary," or The Channel of our Lady of the Rosary.

1792—Subseqnently named by Vancouver in honor of the king.—(Vancouver, vol. 2, page 170.—Life on Puget Sound, page 154).

1846-8—Harrison, Mt.—See Rainier.

1771—Hearne, Sam'l—An employee of the Hudson Bay Co. succeeded in tracing the Coppermine river to tide water in 72°, and his report caused the Lords of Admiralty to send Capt. Cook to the Northwest Coast.—(History of Oregon,—Twiss, page 58).

1775—Heceta, Bruno—Left San Blas for America March 16th. Passed up the entire coast of Oregon, discovered the Columbia river.—(History of Oregon,—Twiss, page 567. Oregon,—Moseley, page 8).

1792—Hood, Mt.—Discovered by Broughton October 29th, and named for Lord Hood.—(Vancouver, vol. 3, page 107.—N. W. Coast of America,—Franchere, page 112).

1846-8—Same as Mt. Washington.—(Oregon and California,—Thornton, vol. 1, page 256).

1846—Said to be in a state of eruption.—(Oregon and California, vol. 1, page 336).

1854—Belden claimed to have ascended it in October, and reported it as 19,400 feet high. He claimed to have ascended as high as possible with snowshoes, then with ice hooks and spikes. When they reached a point some 18,000 feet high respiration became very difficult owing to the rarity of the atmosphere. At length the blood began to ooze through the pores of the skin like drops of sweat; their eyes began to bleed, then the blood gushed from their ears. Then they commenced their downward march. At the point where they commenced the ascent they had left their pack mules, and two men to guard them. The men went out hunting, and when they returned found that the cougars had killed two of their mules.—(Oregon and Washington,—Armstrong, page 38).

(Lying seemed to have been reduced to an art in those days).

1864.—Ascended by Rev. H. K. Hines and the summit described.—(Oregon and its Institutions, —Hines, page 44).

Known among Indians as Pat-to, or high mountain. This was a general term for any high snow-capped mountain.

Located in latitude 45° 22′ 24.3″. Longitude 121° 42′ 49.6″.

1792.—Hood's Canal.—Named by Vancouver for Lord Hood.—(Life on Puget Sound, page 155).

1805.—Hood River.—Called by Lewis and Clarke, La Biche.—(Pac. States, vol. 23, page 45).

1670.—Hudson Bay Co.—Chartered May 16th.—(Burrows' Oregon, page 33).

1842-6.—Indian Trail.—The first pass over the Cascades used by whites was over the southern flank of Mount Hood. Near it was afterwards made the Barlow Road, which was named for Barlow, of Barlow, Palmer and Rector, who were compelled to abandon their trains at the summit and were rescued by a relief party from the Willamette Valley.—(Pac. States, vol. 22, page 645).

1846-8.—Jackson, Mt.—Same as Mt. Pitt of the English. In lat. 41° 40′.—(Oregon and California, —Thornton, vol. 1, page 257.)

1806.—Jefferson, Mt.—Named by Lewis and Clarke for President Jefferson.—(Pac. States, vol. 23, page 61).

1846-8.—Called by the British, Mt. Vancouver.—(Oregon and California, —Thornton, vol. 1, page 257).

Located in latitude 44° 40′ 26.1″. Longitude 121° 48′ 59.9″.

1810-12.—John Day.—A Virginian, accompanied the Northwest Co. to Astoria. He was 6 feet, 2 inches in height.—(Pac. States, vol. 23, page 179).

1805.—John Day River.—Called by Lewis and Clarke, the Lepage.—(Pac. States, vol. 23. page 41).

1841.—Johnson, Lieut.—Explores the Cascades from Puget Sound.—(Wilkes' Narrative, vol. 4, pages 418 and 424).

1787.—Juan de Fuca Straits.—Discovered by Capt. Barclay, of the Imperial Eagle.

1788.—The entrance was explored by Capt. Meares, in the Felice, and named by him.—(History of Oregon,—Twiss, p. 19.—Pac. States, vol. 22, page 197).

1805—Klickitat River—Called by Lewis and Clarke, Cataract River.—(Pacific States, vol. 23, page 45).

1833—Kelly, Hall J.—First called attention to the feasibility of settling the Pacific Coast by overland emigration. Arrived at Vancouver this year.—(Pacific States, vol. 23, page 549).

1841—Lava formation limited to 48° N.—(Wilkes' Narrative, vol. 4, page 457).

1792—Ledyard leaves Paris for America, under the direction of Jefferson, to discover the River of the West, but is stopped by the Russians.—(Miners' and Travelers' Guide,—Mullan, page 53).

1834—Lee, Rev. Jason—Established the first Mission in the Willamette valley, ten miles below the present Salem.—(History of the Willamette Valley, page 208).

1840—Established a Methodist Mission at the Willamette Falls.—(Pacific States, vol. 23, page 607).

1805-6—Lewis and Clarke—Spent the winter at the mouth of the Columbia.—(Oregon,—Moseley, page 8).

Lewis River—The North Fork was known among Indians as Wicht, and was considered the main river. The South Fork was known as Wa-co-ko, a Pike, (fish); also Yac-co, for Yac-co prairies, near Mt. St. Helens.

1789.—Mackenzie River.—Named for Alexander Mackenzie.—(Zell's Encyclopedia, vol. 2, page 264).

1793.—Mackenzie, Sir Alex.—Reached the Pacific overland, July 22.—(Barrows' Oregon, page 34).

1812.—McKenzie, Donald.—Explored the Willamette Valley one hundred miles or more.—(Pac. States, vol. 23, page 195).

1818.—McKenzie established Ft. Walla Walla.—(Pac. States, vol. 23, page 273).

1825.—McLaughlin, John.—Established Fort Vancouver, introduced live stock, fruit, vegetables, grain, etc. Took possession of Willamette Falls.—(Pac. States, vol. 23, pages 441 and 505).

Madison, Mt.—Is the Mt. McLaughlin of the British. Lat. 43° 30′.—(Oregon and California,—Thornton, vol. 1, page 257).

Mary's River —Named for an Indian woman, wife of a white man, who had great trouble in making the crossing. Afterwards applied to Mary's Peak, because the river rises there.—(Oregon and its Institutions,—Hines, page 22).

1788.—Meares, Capt.—Reached the mouth of the Columbia without discovering it, July 6th.—(History of Oregon,—Twiss, page 95).

1840.—Meek, Joe.—Arrived in the Willamette Valley.—(Pac. States, vol. 23, page 456).

1846.—Modoc Lakes.—Discovered by Jesse Applegate.—(Pac. States, vol. 22, page 642).

1823.—Monroe Doctrine proclaimed.—(Burrows' Oregon, page 24).

1846-8.—Monroe, Mt.—Same as Mt. Shasta.—(Ore. and Cal.,—Thornton, vol. 1, page 257).

1853.—Nachess Pass.—5000 feet above sea level.—(Narrative of 1853,—Stevens, vol. 1, page 259).

1792.—Neah Bay.—Called by Vancouver, Poverty Cove, and by the Spaniards, Port Nunez Gaona.— (Three Years' Residence in W. T.,—Swan. page 119).

1579.—New Albion.—Named by Drake, who was crowned by the natives as their king.—History of Oregon and California,—Greenhow, page 73; also, page 53 Mountains of Oregon.)

1792.—New Dungeness.—Named by Vancouver for Dungeness, in the British Channel, because of the similar appearance.—(Vancouver, vol. 2, page 55).

1883.—Nickel Deposit in Douglas County.—(Mineral Resources of the U. S.,—Williams, page 403).

1778.—Nootka Sound.—Discovered by Capt. Cook, and named King George's Sound, then changed by him to Nootka.—(Voyages of Capt. Cook, vol. 2, page 270.)

1790.—Nootka Treaty.—Formed between Spain and England.—(Barrows' Oregon, page 14).

1818.—Northern Boundary of the U. S. located at 49° due west to the Rocky Mountains.—(Burrow's Oregon, page 54.)

1843.—Nez Perces.—Pierced Nose.—(Fremont, page 181).

1834.—Nuttall and Townsend, scientists, arrived at Fort Vancouver with Wyeth.—(Pac. States, vol. 23, page 577).

1792—Oak Point.—Named by Broughton because of finding the first oak trees there.—(Vanconver, vol. 3, page 100).

1788—Olympus, Mt.—Named by Capt. Meares, July 4th. Discovered by Juan Perez, a Spanish pilot, and called El Cero de la Santa Rosalia.—(Narrative of 1853, vol. 1, page 262).

1774—Oregon.—First used by Capt. Jonathan Carver. —(History of the Willamette Valley, page 73. See also page 53, Mountains of Oregon).

1846—Bounded on the north by the 49°, on the east by the Rocky Mountains, on the south by the 42°, and on the west by the Pacific Ocean.— (Oregon and California,— Thornton, page 251).

1846—Northern boundary first settled by treaty, July 17.—(Barrows' Oregon, page 282).

1871-2—Northern boundary finally settled by arbitration.—(Barrows' Oregon, pages 56 and 318).

1874—Once inhabited by a great number and variety of pre-Adamite beasts.—(The Columbia River and Puget Sound,—Nordhoff, Harper's Magazine for February, page 344).

1818—Occupied jointly by the United States and England for ten years.—(Barrows' Oregon, page 55).

1859—Admitted to the Union with present limits, February 14th.—(Zell's Encyclopedia, vol. 2, page 527. Hill's Annotated Laws of Oregon, vol. 1, page 77).

1792—Orford, Cape.—Named by Vancouver for Earl (George) Orford.—(Vancouver, vol. 2, page 23).

1812-13—Pacific Fur Company.—The plot to rob Astor shown up by an Englishman.—(History of Oregon, —Twiss, page 24).

1513—Pacific Ocean.—Discovered by Vasco Nunez de Balboa, governor of the Spanish colony of Darien, and named by Fernando Magalhaens, or, Magellan, a Portugese in the naval service of Spain, because of being so little disturbed by storms. Spoken of as "Mar del Sur." —(History of Oregon and California,—Greenhow, pages 48 and 78. Barrows' Oregon, page 2).

1835—Parker, Rev. Samuel.—Sent to Oregon by the American Board of Foreign Missions.—(Oregon and California, vol. 2, page 22).

1745—Parliamentary Grant.—£20,000 voted by the House of Commons for the discovery of a northwest passage by a British vessel.—(History of Oregon,—Twiss, page 58).

1774 — Perez, Juan. — Anchored in Nootka Sound.—(History of Oregon,—Twiss, page 55).

1846-8—Pitt, Mt.—Called at one time Mt. Jackson. (Oregon and California, —Thornton, vol. 1, page 257).

1792—Point Adams.—See Adams' Point.

Point de los Reys.—Named by the Spaniards.—(Vancouver, vol. 2, page 413).

1791 — Port Angeles. — Named by Don Francisco Elisa, the Mexican. Called by Vancouver False Dungeness, because of a similar appearance to New Dungeness.—(Life on Puget Sound, page 153).

1792—Port Discovery.—Named by Vancouver, for one of his ships.—(Vancouver, vol. 2, page 66).

1841—Port Gamble.—Named by Wilkes for Gamble, a U. S. Naval officer.—(Narrative of 1853, vol. 1, page 284).

1869—Known among Indians as Teekalet.—(Life on Puget Sound, page 156).

1842—Portland.—Established by A. L. Lovejoy and F. W. Pettygrove, and name agreed upon by tossing up a cent.—(Portland City Directory for 1872, page 10).

1786—Portlock, Capt.—See Dixon and Portlock.

1841—Port Ludlow.—Surveyed by Wilkes, and named for Ludlow, a U. S. Naval officer.—(Narrative of 1853, vol. 1, page 283).

1792—Port Townsend.—Visited by Vancouver, May 8th, and named in honor of the Marquis of Townshend, who signed Vancouver's instructions. The h was subsequently dropped.—(Life on Puget Sound, page 155). Stephens' Narrative of 1853, vol. 1, page 283. Vancouver, vol. 2, page 76).

1853—Known among Indians as Kahtai.—(Canoe and Saddle,—Winthrop, page 11).

1854—Surveyed by the U. S. Coast Survey.—(Stevens' Narrative of 1853, vol. 1, page 283.

1792—Possession Sound.—So named by Vancouver, because he landed there on King George's birthday, and took possession of the country.—(The Oregon Territory,—Nicolay, page 53.—Vancouver, vol. 2, page 170).

1792—Puget Sound.—Discovered by Vancouver's lieutenant, Peter Puget, and so named by Vancouver May 19th.—(Vancouver, vol. 2, page 146.—Narrative of 1853, vol. 1, page 289).

1853—Known among Indians as Whulge.—(Canoe and Saddle,—Winthrop, page 11; also among Klalams as K'uk'-luts page 43).

1792—Protection Island.—Named by Vancouver because of its advantageous location with reference to the harbor.—(Vancouver, vol. 2, page 67).

1787—Queen Charlotte Islands.—Named by Dixon.—(Encyclopædia Brittanica, vol. 20, page 170).

1789—Capt. Gray sailed round it and named it Washington, for his sloop.—(Backwoods of Canada and Oregon Territory,—Nicolay, page 38).

1786—Queen Charlotte Sound.—Named by Wedgboro in August.—(Vancouver, vol. 2, page 308.)

1841—Rainier and St. Helens in activity.—(Wilkes Narrative, vol. 4, page 440).

1792—Rainier, Mt.—Discovered by Vancouver on May 8th and named for Rear Admiral Rainier of the English Navy.—(Vancouver, vol. 2, page 79).

1843—An active volcano, November 13.—(Fremont, page 193).

1846-8—Also known as Mt. Harrison.—(Oregon and California,—Thornton, vol. 1, page 257. See pages 54, 55 and 59. Also Tacoma).

Rock Creek, near Mt. St. Helens, known among Indians as "Cut-to" (a sort of guttural sound on first syllable), which means "swift stream."

1742-3—Rocky Mountains.—Named by Verendrye Brothers.—(History of the Willamette Valley, page 70).

1798—Russian American Fur Co. given exclusive privileges.—(Barrows' Oregon, page 23).

1821—Russia claims by public decree all of the Pacific Coast north of latitude 51°. This claim was disputed by the U. S.—(Barrows' Oregon, page 24).

1812—Russians established at Bodega Bay.—(Barrows' Oregon, page 23).

1820—Russians establish a fort forty miles north of Bodega Bay.—(Barrows' Oregon, page 23).

1766—Russian Fur Companies organized to operate in America.—(Barrows' Oregon, page 23).

1824—Russia withdraws to 54° 40′.—(Barrows' Oregon, page 25).

1824—Russia withdraws from California at the request of the U. S.—(Barrows' Oregon, page 26).

1697—Ryswick Treaty Formed.—(Barrows' Oregon, page 1. American Cyclopedia, vol. 14, page 245).

1842—Saddle Mountain.—Called by the Indians "Swallalahoost." Named by Wilkes, "Saddle Mountain." —(Oregon and Its Institutions, —Hines, page 21).

1805—Sandy River.—Called by Lewis & Clarke, "Quicksand River."—(Pacific States, vol. 23, page 48).

1741—St. Elias, Mt.—Discovered by Behring, July 18th.—(History of the Willamette Valley, page 58).

1792—St. Helens, Mt.—Named by Vancouver for His Majesty's embassador at Madrid, October 20.—(Vancouver, vol. 2, page 399).

1831—In a state of eruption.—(Oregon and California, —Thornton, vol. 1, page 256).

1843—In activity November 13.—(Fremont, page 193).

1846—Known among Americans as Mt. Washington.—(The Oregon Territory,—Nicolay, page 109).

1843—Described when in a state of eruption.—(History of Oregon,—Wilkes, page 109).

1846-8—Known also as Mt. John Adams.—(Oregon and California, —Thornton, vol. 1, page 256).

1852-4—An active volcano.—(Three years' residence in W. T., Swan,—page 395. Canoe and Saddle, page 48).

Known among Indians as "Lou-wala'-clough," meaning Smoking Mountain.

Located in latitude 46° 11′ 52.3″. Longitude 122° 12′ 37″.

1805—Sauvies Island.—Called by Lewis and Clarke, Wapato Island, because of an abundance of wapatos found there. It subsequently acquired its name from Jean Baptiste Sauve, a French Canadian, who established a dairy there after the abandonment of Ft. William.—(Pacific States, vol. 23, pages 48 and 598).

Seattle.—Named for an Indian.—(Harper's Monthly for September, 1870, page 490).

1846—Shasta, Mt.—Called Pitt by the English, Jackson and Monroe by the Americans, and Shasta by the trappers.—(The Oregon Territory, —Nicolay, page 109). (Oregon and California,—Thornton, vol 1, page 257).

1788—Shoalwater Bay.—Discovered and named by Captain John Mears, July 5th.—(Mears' Voyages, vol. 1, page 263).

1852—First surveyed by Lieut. Com. Alden.—(Narrative of 1853, vol. 1, page 263).

1792—Skagit Head.—Named by Vancouver.—(Life on Puget Sound, page 156).

1836.—Slacum, Wm. A.—An agent of the State Department, in the guise of a private citizen, visited the Columbia and Willamette Rivers.—(Pacific States, vol. 23, page 602).

Spain's First Claim to Oregon.—(Barrows' Oregon, page 12).

1795.—Spain withdraws from Oregon.—(Barrows' Oregon, page 14).

Spaniards coveted a position in the East Indies, but the Bull of Pope Alexander III precluded them from sailing eastward, round the Cape of Good Hope, hence their attempts to go by way of the Pacific.—(History of Oregon,—Twiss, page 50).

1800.—Spanish territory west of the Mississippi conveyed to France.—(Barrows' Oregon, page 210).

1814.—Spanish claims conceded to the United States through France and acknowledged by Great Britain.—(Barrows' Oregon, page 208).

Spelyah Prairie.—An Indian name, meaning Cayote.

Spirit Lake.—Near Mt. St. Helens. Indian name, Che-wa-tum, meaning Spirit.

1499-1500.—Straits of Anian.—Supposed to have been discovered by Gaspar Cortereal, who explored the coasts of Labrador, and named by him. The name possibly signifies Brother. Cortereal had two brothers with him. In the earliest maps the northwest part of America is called Ania. Ani, in the Japanese language, signifies Brother.—(History of Oregon and California,—Greenhow, page 47).

1592.—Purchas claimed in the seventeenth century, in his "Pilgrims"—a narrative—that a Greek pilot, called Juan de Fuca, in the service of the Spaniards, had informed Michael Lock, the elder, whilst he was sojourning at Venice, that he had dicovered (1596) the outlet of the Straits of Anian, in the Pacific Ocean, between 47° and

48°, and had sailed through it into the North Sea.—(History of Oregon,—Twiss, page 18.—History of Oregon and California,—Greenhow, page 87).

1841.—Sunken Forest in the Columbia described.—(Wilkes' Narrative, vol. 4, page 381.—Burnett's Recollections of a Pioneer, page 136.—The Oregon Territory, Nicolay,—page 137.—Fremont, page 195).

1841.—Survey of Puget Sound finished.—(Wilkes' Narrative, vol. 4, page 479).

Tacoma, Mt.—Ta-ho-ma is the Indian name for the Great Spirit who dwells on the mountains.—(George Baily, in the Overland Monthly for Sept., 1886, page 268).

1853—Called by the Indians, Tacoma, a generic term also applied to all snow peaks.—(Canoe and Saddle,—Winthrop, page 44).

Tacoma the Second.—See Mt. Adams.

Tamanous is the name of the Great Spirit supposed to dwell on this mountain.—(Canoe and Saddle, page 131). Tacoma the Less—(Canoe and Saddle, page 280). Each fiery Tacoma.—(Canoe and Saddle, page 286). The eruptions of the Tacomas.—(Canoe and Saddle, page 287). Tacoma, the Nourishing Breast. Tahoma, almost to Heaven.—(Life on Puget Sound,—Leighton, page 39). Red Tamahnous, Love.—(Life on Puget Sound,—page 41), Black Tamahnous, Hate, Anger.—(Life on Puget Sound, page 114).

1841—Tenino Mounds—Described.—(Wilkes' Narrative, vol. 4, page 415).

1848-9—Territorial Government.—Granted, covering all the original Oregon.—(Barrow's Oregon, page 335. Encyclopædia Brittanica, vol. 17, page 825. General Laws of Oregon, page 52).

The Dalles.—Stone pavement, or trough, or gutter.—(Pacific States, vol. 23, page 44).

1788—Tillamook Bay.—Known as Murderers' Harbor and Quicksand Bay.—(Pacific States, vol. 22, pages 188 and 198).

1806—Tillamook, or Killamook Head.—Called by Clarke, Clarke's Point of View.—(Pacific States, vol. 22, page 164, and vol. 23, page 58).

1792—Tongue Point.—Named by Broughton.—(Vancouver, vol. 3, page 86).
1805—Called by Lewis and Clarke, William.—(Pacific States, vol. 23, page 53).

1834—Townsend, John K.—A member of the Philadelphia Academy of Natural Science, arrived at Vancouver with Wyeth, Sept. 16th.—(Townsend's Narrative, page 169. Pacific States, vol. 23, page 577).

Trout Lake.—Near Mt. St. Helens. Known among Indians as Qual-i'-as, meaning Trout.

1806—Umatilla River.—Called by the Indians, "Youmalolam."—(Pacific States, vol. 23, page 64). Named for the Umatilla tribe of Indians.

1832—Umpqua Fort.—Built by John McLeod for the Hudson's Bay Co.—(Pacific States, vol. 23, page 521).

1792—United States' Claims to Oregon.—1st, right of discovery; 2d, by the Louisiana purchase; 3d, by prior explorations; 4th, by prior settlements.—(Barrows' Oregon, pages 213, 216, 217 and 219).

1713—Utrecht Treaty.—Between France and England.—(Barrows' Oregon, page 18).

1846-8—Van Buren, Mt.—Same as Olympus.—(Oregon and California,—Thornton, vol. 1, page 257).

1826—Vancouver, Fort.—Established by John McLaughlin, and

1849—As a United States military post.—(Pacific States, vol. 23, pages 437 and 439).

1792—Vancouver Island.—Named by Vancouver, Quadra and Vancouver Island. — (Vancouver, vol. 2, page 357).

1598—Viscaino, Sebastian.—Reached a headland at 42° to which he gave name of Cape Sebastian. The smallest of his three vessels, however, conducted by Martin d'Aguilar and Antonio Florez, doubled Cape Mendocino and reached 43° where they found the mouth of a

1543—River which Cabrillo has been supposed to have discovered.—(History of Oregon,— Twiss, page 53).

1818—Walla Walla, Fort.—Established by McKenzie.—(Pacific States, vol. 23, page 273).

1805—Wapato Island.—See Sauvie's Island, also—(Pacific States, vol. 23, page 593).

Wasco.—Horn Basin.—(Pacific States, vol. 23, page 44).

1853—Washington Territory formed March 2d.—(American Cyclopedia, vol. 12, page 560. Zell's Encyclopædia, vol. 2, page 527).

1805—Washougal River.—Called by Lewis and Clarke, Seal River.—(Pacific States, vol. 23, page 48).

1792—Whidby's Island.—Named by Vancouver for one of his officers who explored it.—(Vancouver, vol. 2, page 180).

1805—White Salmon.—Called Canoe River by Lewis and Clarke.—(Pacific States, vol. 23. page 45).

1836—Whitman, Dr. Marcus, arrived at Vancouver in September.—(History of the Willamette Valley, page 213).

1842—Started on his famous ride to Washington, October 3d, to prevent our government from abandoning Oregon.—(Barrow's Oregon, page 166).

1843—Saved by a mule.—(Barrows' Oregon, page 170).

1843—Returns from Washington, September 4th, accompanied by 200 wagons and 875 immigrants.—(Barrows' Oregon, page 250).

1847—Murdered by the Indians in November.—(Barrows' Oregon, page 320).

1841—Wilkes, Charles,—Drayton, R. R. Waldron and two other men visited the Willamette Valley on a scientific campaign.—(Pacific States, vol. 23, page 673. Wilkes' Narrative, vol. 4, page 341).

1829—Willamette Falls taken possession of by McLaughlin, and a saw mill established.—(Pacific States, vol. 23, page 505).

1806—Willamette River.—Part of it called by the Indians Multnomah.—(Pacific States, vol. 23, page 60).

1843—Winds, peculiarity of, in the Columbia River.—(Fremont, page 190).

1834—Work, John.—explored the Umpqua region.—(Pacific States, vol. 23, page 527).

1832.—Wyeth, Nathaniel J.—Arrives at Vancouver.

1834—Arrives there second time, September 16th. Established Fort William and a Salmon fishery on Wapato Island on his second trip.

1837—Returns to Oregon again and sells Forts William and Hall to the Hudson's Bay Co.—(Pacific States, vol. 23, pages 564, 592, 594 and 598).

Yaquina Bay—Probably named for Yaquina, a female Indian chief.—(Life on Puget Sound, page 174).

1805—Young's Bay.—Called by Lewis and Clarke, Meriwether Bay.—(Pacific States, vol. 23, page 54).

1792—Young's River.—Named by Broughton for Sir George Young of the Royal Navy.—(Vancouver, vol. 3, page 90).

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